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U.S. Army Survey of Nurses and Nursing Students: Sampling Frame and Survey Development

Pat Lerro, John Morrison, and Peter Ramsberger

HumRRO International, Inc.



for

Contracting Officer's Representative Tanya J. Guthrie

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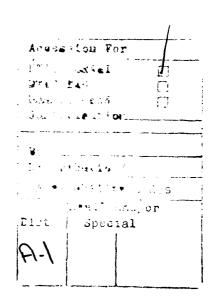
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HumRRO International, Inc.

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13. ABSTRACT (Maximum 200 words)

This report describes the rationale for the study of nurses and the development of the sampling frame and questionnaires for a survey of registered nurses and nursing students. An understanding of the perceptions of the U.S. Army and Army nursing by registered nurses and nursing students is important to U.S. Army policymakers and recruiters. Development of the sampling frame for registered nurses involved the selection of states by cluster sampling, with the selection of respondents randomly within states. Development of the sampling frame for nursing students involved the selection of nursing schools by cluster sampling. The surveys ask a series of questions on education level, employment status, satisfaction with nursing, attitudes about the Army Nurse Corps Active Duty and Reserve programs, and the impact of Desert Storm and similar possible actions on feelings about joining the military.

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Within HII, a number of people contributed to this effort. Pat Lerro served as the project director and, along with Peter Ramsberger, designed the surveys. Gene Drucker and John Morrison contacted each state to obtain the lists of registered nurses. Ani Difazio and Jeff Barnes screened the state tapes. Bruce Belden and Emayeneme Gbemiye-Etta developed the mailing lists. Charles Cowan aided by Brian Waters developed the sampling methodology. Susan Cuddy and Pam Croom prepared the surveys. Cuddy administered the prototype surveys to nurses and nursing students. Special thanks $_{\rm go\ to}$ Emma James for typing and editing this report.

U.S. ARMY SURVEY OF NURSES AND NURSING STUDENTS: SAMPLING FRAME AND SURVEY DEVELOPMENT

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U.S. ARMY SURVEY OF NURSES AND NURSING STUDENTS: SAMPLING FRAME AND SURVEY DEVELOPMENT

Introduction

Nurse Prototype Survey Objectives

This report describes the activities associated with preparing a nationally representative survey of registered nurses and nursing students. The activities included

- Methodology to provide data on the perceptions of the nursing profession and of Army nursing by private sector registered nurses and nursing students.
- A statistically valid sampling frame of registered nurses and nursing students and preparation of mailing labels for registered nurses and schools of nursing selected for the survey.
- Prototype survey instruments of registered nurses and nursing students that include perceptions of the Regular Army and Army Reserves.
- · A package for OMB approval of the surveys.

Background

In private and public institutions, registered nurses compose the largest group of professionals in the health care delivery system. Demographic trends referred to as the "greying of America" and increased demand across all health care settings have contributed significantly to a shortage of nurses. The shortage was reported as real, widespread, and of significant magnitude. Other factors contributing to the shortfall involve the percentage of nurses who work only part-time and a high rate of turnover among hospital nurses. Often, nurse turnover in hospitals is due to nurses leaving the profession, rather than transferring to another facility or agency.

Recruiting and Retaining Nurses: An Annotated Bibliography. B. Roberts, I. Kocher, and G.W. Thomas. The Naval Postgraduate school, Monterey, CA, December 1990, contains abstracts of approximately 115 studies and articles that provide a broad information base for identifying nurse labor market supply and demand factors as well as attitudinal information such as job satisfaction.

² A full discussion of the national shortages, their causes, and proposed remedies are found in the Secretary's Commission on Nursing: Volume I - Final Report, Department of Health and Human Services, Washington, DC, December 1988.

To attract more individuals to the nursing profession, bring back a number who have left the profession, and retain those already employed, health care institutions have incorporated initiatives that address the role, prestige, and compensation of registered nurses. Actions taken include involving nurses more in the clinical decision process, providing nurses a greater degree of autonomy, and increasing wages significantly.

The U.S. Army is examining the role of the Army nurse in its health care delivery system. In addition to examining factors similar to those in the civilian sector, the Army is addressing three additional factors that affect the Army's ability to recruit and retain nurses. The first factor is economics. Today, civilian wage scales for nurses, at least in hospital and agency settings, and for certain specialties, are equal to or much higher than those offered by the military.

A second factor is related to the Army's primary mission. It is not known the degree to which combat activities such as Operation Just Cause (Panama) and Operation Desert Storm affected attitudes of nursing prospects or the double-digit declination rate of nurse applicants. The two military operations brought to the forefront that separation from loved ones, deployment to hostile environments, and the reality of being placed in harm's way are all a part of Service life. Army nurse recruiters must respond to such questions from applicants.

A third factor involves nurses' perceptions of the working environment, types of clinical assignments, clinical authority, training opportunities, and other medical policies and practices in the Army. Army Nurse Corps (ANC), personnel policy, and recruiting managers want to measure the breadth and depth of such perceptions.

The surveys of registered nurses and nursing students will help the Army increase its understanding of their perceptions and beliefs about the Army. That knowledge will be an important aspect to designing and communicating the programs that will attract civilian nurses to Army nursing.

This report provides the sample design, sample selection procedures, and describes the activities associated with obtaining tapes, disks, and hard-copy name lists of registered nurses and schools of nursing. Finally, the report describes the process through which the survey instruments were developed. Copies of the survey instruments and other information are contained in the appendices.

Sample Design

The methodology used to derive the sampling frames for Registered Nurses and student nurses is described below. For both populations, HumRRO International, Inc. (HII) designed a representative sample using a self-weighting cluster technique. HII derived sample sizes and procedures for weighting. Two mail-

out samples of nurses were selected -- 10,860 registered and 4,000 nursing students. These should result in returns of 3,000 registered and 2,000 student nurse surveys.

Registered Nurse Sample

Sampling frame of registered nurses. The 50 states and the District of Columbia were contacted to ascertain the number of registered nurses in their jurisdictions. Table 1 displays the state-provided data, ordered by number of nurses in each state. The total number of nurses (excluding New Hampshire which would not provide the information due to state law) was 2,533,300. The project sampling frame includes all registered nurses in the U. S. who are currently working as a full-time nurse, and who are 45 years old or less, and thus are eligible for entry into the military.

Sampling strategy for registered nurses. A representative sample of registered nurses in the United States is required. Conceptually, the easiest approach would be to construct a list of all 2.5+ million nurses and randomly select from this list. Unfortunately, the cost of constructing this list is very high.

An efficient way to achieve this goal is by employing a self-weighting³ methodology. To construct a self-weighting sample, the population must be defined in terms of primary sampling units and ultimate (or secondary) sampling units. In this instance, the primary sampling units are States, and the ultimate sampling units are individual nurses. In a self-weighting cluster sample, the product of the probability of selecting a primary sampling unit and the probability of selecting an ultimate sampling unit, given a primary sampling unit, is the same across all clusters. That is, all ultimate sampling units are equally likely to be selected into the sample. To implement this procedure, we must determine the number of primary sampling units to include, randomly select the primary sampling units (i.e., state lists), and then randomly select an equal number of nurses from each state list.

The methodology calls for a final sample of 3,000 registered nurses. To determine how many surveys need to be mailed to achieve this figure, a response rate of 50 percent was assumed (with follow-up). The response rate from a 1988 national Nurse Survey of the same population yielded a return rate of 80.7 percent. Thus, the 50 percent expectation is considered conserva-

³ A self-weighting sample is a special form of a cluster (or area) sample where the probability of any ultimate sampling unit (i.e., nurses) entering the sample is the same.

⁴ Moses, E. (1988). The Registered Nurse Population: Findings from the National Sample Survey of Registered Nurses. Washington, DC: Public Health Service, U. S. Department of Health and Human Services.

TABLE 1
STATE SAMPLING OF REGISTERED NURSES

	SIAILS		PLING OF	NEGIS I ENED I	TUNGLG		
			NUMBER	CUMULATIVE	RANDOM		SELECTION
	STATE		NURSES	FREQUENCY	NUMBER	t = N/r	PROBABILITY
	NY		225,000	225,000		207	0.000429
	CA	=	220,000	445,000	231575	203	0.000429
	PA	=	178,000	623,000	484905	164	0.000429
	OH	*	127,000	750,000	738235	117	0.000429
	TΧ		125,000	875,000		115	0.000429
	FL	*	120,000	995,000	991565	110	0.000429
	IL		108,000	1,103,000		99	0.000429
	MI		102,000	1,205,000		94	0.000429
	NJ	=	102,000	1,307,000	1244895	94	0.000429
	MA		93,000	1,400,000		86	0.000429
	VA		65,000	1,465,808		60	0.000429
	NC	•	63,000	1,528,000	1498225	58	0.000429
	IN		61,000	1,589,000		56	0.000429
	GA		57,000	1,646,000		52	0.000429
	МО		57,000	1,703,000		52	0.000429
	WS	*	55,000	1,758,000	1751555	51	0.000429
	MD		52,000	1,810,000		48	0.000429
	WA		50,000	1,860,000		46	0.000429
	MN		47,000	1,907,000		43	0.000429
	TN		46,000	1,953,000		42	0.000429
	AZ		40,000	1,993,000		37	0.000429
	CT		39,000	2,032,000	2004885	36	0.000429
	LA		32,000	2,064,000	200 1000	29	0.000429
	AL		31,000	2,095,000		29	0.000423
	KY		31,000	2,126,000		29	0.000423
	OR		31,000	2,157,000		29	0.000429
	CO		30,000	2,137,000		28	0.000423
	ia		30,000	2, 181,000 2,217,000		28	0.000429
	KS	*			2250215	24	
	OK		26,000	2,243,000	2258215	2 4 22	0. 000429 0. 000429
	SC		24,000	2,267,000			
			24,000	2,291,000		22	0.000429
	HI		23,000	2,314,000		21	0.000429
	AR		21,000	2,335,000		19	0.000429
	wv		28,000	2,355,000		18	0.000429
	DC		19,000	2,374,000		17	0.000429
	MS		19,000	2,393,000		17	0.000429
	ME		18,000	2,411,000		17	0.000429
	NE		17,000	2,428,000		16	0.000429
	RI		14,000	2,442,000		13	0.000429
	UT		14,000	2,456,000		13	0.000429
	DE		10,000	2,466,000		9	0.000429
	MT		9,900	2,475,900		9	0.000429
	NV		9,900	2,485,800		9	0.009429
	NM		9, 600	2 , 43 5 , 400		9	0. 000429
	SD		8,000	2,503,400		7	0.000429
	ID 	_	7,800	2,511,200		7	0.000429
	ND	=	7,100	2,518,300	2511545	7	0. 000429
	VT		7,000	2,525,300		6	0.000429
	AK		4,000	2,5 29 ,300		4	0. 000429
	WY		4, 000	2,5 33,300		4	0. 000429
	NH			2,533,300		0	0.0000
_	TOTAL	- 2	,533,300				

START = 251,575

^{*} State included in Sample

tive. Based on the results of this same 1988 study, it was assumed that 85 percent of the nurses on the state rosters would be actively working in nursing and that 65 percent would be 45 or younger. These estimates are used in calculating the required size of each of the state mailout samples.

<u>Sampling procedures for registered nurses</u>. The following steps were taken to identify the sample.

First, we determine the size of the mail/out sample. Our lists consist of all registered nurses licensed to practice. The mailout sample must be sufficiently large to account for screening loss (those not active and not age qualified for military service) and non-response. The following formula was used to derive the size of the mailout required to achieve a final sample size of 3,000:

$$\frac{3,000}{.50 * .85 * .65} = 10,860$$

Second, we determine the number of status to select. There are several criteria to consider when determining the number of clusters to include. Ideally, we want to ensure that the number of clusters is less than or equal to the maximum number that guarantees that a primary sampling unit can enter the sample once. In addition, we want to select enough to ensure that the sampling rate from a state is not excessively high (greater than 25 percent). To determine the maximum number, we divide the total population of nurses by the nurse population of the biggest sampling block (New York with 225,000 nurses). Without splitting lists into smaller components, the maximum number of state lists is 11. The smallest states have 4,000 nurses. To ensure a sampling rate of no more than 25 percent requires at least 10 states.

One can also calculate the optimum number of clusters based on the precision desired and cost of including additional clusters. Based on experience with similar state-based cluster samples, 10 states was optimal. Using these criterion, the number of states to include in the sample should be either 10 or 11. We chose to include 10 states. In addition to satisfying the aforementioned criterion, this would ensure that the sample would include large and small states, as well as achieve reasonable geographic representation.

Third, we determine the states from which the nurses will be sampled. First, the total number of nurses was divided by the number of states to be selected, as follows:

⁵ Cochran, William G., <u>Sampling Techniques</u>, John Wiley, New York, NY, 1963.

$$\frac{2,533,300}{10}$$
 = 253,330

In essence, this number reflects the fact that, if we wanted to include one nurse from each of 10 states we would have to pick every 253,330th nurse. The ten primary sampling units can be determined from the list of states.

The states are rank ordered by number of nurses registered in each, as shown in Table 1. The cumulative frequency of nurses is shown in the third column. We could have randomly ordered the states as well. However, by ordering by size, we guarantee that states of every size will be included in the sample. In addition, we avoid including two or more of the smaller states where the probability of being included in the sample is relatively high.

If each of the nurses is thought of as having a number, then nurses 1 through 225,000 are in New York, nurses 225,001 through 445,000 are in California, and so on. Next we select a random number between 1 and 253,330 as a starting point. The number selected in this case (by random number generator) was 231,575. This means that nurse 231,575 (our random number) is in California, which will be included in the sample of states. To select nurses from ten states, we then select nurse 231,575 + 253,330, or nurse 484,905 who would be from Pennsylvania. Thus Pennsylvania is included in the sample. This process continues until adding 253,330 to the last number exceeds the total number of registered nurses in the country. Thus, North Dako a is the final state included, because nurse 2,511,545 falls in this state and 2,511,545 + 253,330 exceeds 2,533,300. This process, known as a take-every strategy, resulted in the selection of 10 states, as shown in Table 1.

By employing a take-every strategy, we created 253,330 "necklaces" of 1 primary sampling units (i.e., states). The probability of any state entering the sample was the nurse population of the state divided by 253,330. Please note that ordering the states by size does not change the probability that a state will enter the sample. It just ensures that the sample will not consist entirely of states with large nurse populations or have an unrepresentative number of states with small nurse populations.

Next, we determine number of nurses to be selected from each state. To be self-weighting, the number of ultimate sampling units (i.e., nurses) from each primary sampling unit (i.e. states) must be the same. Accordingly, the number of nurses to be sampled from each state (n) is:

$$n = \frac{10,860}{10} = 1,086$$

Finally, we draw the sample. The order of nurses on each of the selected 10 state lists is randomized. To obtain 1,086 nurses from each state, we must select every t_i th nurse, where t_i equals:

$$t_i = \frac{Total \ Number \ of \ Nurses \ within \ State}{1,086}$$

So, using New York as an example, to obtain 1,086 nurses, we must select:

$$t_{NY} = \frac{225,000}{1,086} = 207$$

or every 207th nurse from New York (t_{NY}) . Operationally, this can be achieved by assigning a large random number to each nurse in a list, sorting the list by this random number in either ascending or descending order, and selecting the first 1,086 nurses in the sorted list. This procedure is equivalent to randomly selecting a "starting point" from 1 to t_i and then selecting every t_i th nurse until 1,086 nurses have been identified for each of the 10 states.

The probability of any nurse being selected into the sample is:

$$\frac{N_i}{N_t / 10} * \frac{1,086}{N_i} = \frac{10 * 1,086}{N_t}$$

where N_i = Nurse population of State,

and where

$$N_{t} = \sum_{i=1}^{51} N_{i}$$

Let us consider an example. New Jersey has an estimated nurse population of 102,000. Using the take-every strategy, the probability of New Jersey being included in the sample is:

$$\frac{N_i}{N_r / 10} = \frac{102,000}{2,533,300 / 10} = 0.402$$

Assuming that 1,086 nurses will be selected from New Jersey, the probability of an individual nurse being selected is:

$$\frac{1,086}{N_I} = \frac{1,086}{102,000} = 0.0106$$

Since the selections of states and individual nurses are independent, the joint probability of selecting an individual nurse from New Jersey is the product of the probabilities. That is:

$$\frac{102,000}{2,533,300/10} * \frac{1,086}{102,000} = 0.000429$$

As shown in Table 1, this probability is the same across all states.

Weights for all nurses are the inverse of the sampling probabilities. That is:

The sampling probabilities and weights are equivalent to those of a simple random sample. We are planning a single non-response adjustment across the 10 states. The weighting equation shown earlier will appropriately weight the entire sample.

Student Nurse Sample

The desired sample for nursing students is 2,000 juniors and seniors from colleges across the U.S. with accredited nursing programs leading to a bachelors degree in nursing.

Sampling frame of student nurses. According to the 1990-1991 Fnrollment & Graduations in Baccalaureate & Graduate Programs in Nursing (American Association of Colleges of Nursing, 1991), in

the Fall of 1990 there were 389 generic bachelors programs with 37,613 full-time junior/senior students.

Sampling strategy for student nurses. As with the registered nurses, a self-weighted sample of student nurses is desired. This is more difficult with the students, however, since college nursing directors have to approve participation and data collection for the study. This may result in a non-random sample within colleges, given that participation is voluntary.

<u>Sampling procedures for student nurses</u>. In determining the size of the mailout student sample, a 50 percent return rate was assumed. With a desired final sample of 2,000 completed surveys, the following calculation was made:

$$\frac{2,000}{.50}$$
 = 4,000 (Required Mailout Sample)

First, we solicited support from colleges and universities. Six hundred and fifteen Deans of Schools of Nursing were sent a package requesting the school's participation in the study. For those colleges agreeing, the number of junior/senior nursing students (P_i) was requested. These numbers will be used, as in the registered nurse sampling, to weight the returned survey data. No participating college is expected to have less than 25 student nurses within the sampling frame. Therefore, student nurses per school was set at 25, yielding a requirement for 160 schools to be sampled (4000/25).

Second, we order the primary sampling units. The primary sampling units (i.e., nursing schools) will be ordered from largest to smallest using the population data provided by the participating schools. A random "starting point" from 1 to $S_t/160~(S_t=$ Total number of student nurses) will be selected. Using the cumulative frequency distribution of the ordered list of colleges, colleges will be selected in the same manner described for registered nurses. That is, beginning with the starting point, schools will be included which correspond to the take-every $S_t/160~$ student.

Third, we identified the number of students (n) to be sampled from each college:

$$n = \frac{4,000}{160} = 25$$

Each college selected will be mailed 25 surveys for distribution to a sample of its student nurse juniors and seniors. They

will be returned in one package per college. Instructions will be provided to ensure students are selected on a random basis. We assume that nursing students in schools participating are like those in colleges not participating in the project, thus producing a self-weighting sample. Sample probabilities are:

$$\frac{P_i}{\sum_{i=1}^{P_i} /160} * \frac{25}{P_i}$$

Weights for the student nurses are the inverse of sample probabilities. That is:

$$\frac{\sum_{i=1}^{E} P_i}{25*160} = Weight$$

Estimation Procedures and Accuracy Obtained

Special procedures will be employed to assure that the sampling process adequately represents the full range of schools over the entire nation. Particular care will be given to the replacement of schools that are initially selected, but unwilling or unable to cooperate in the subsequent second stage selection of students.

Total samples of approximately 3,000 registered nurses and 2,000 nursing students will allow the estimation of questionnaire responses for these populations with better than 95 percent accuracy (within .05 standard deviation).

Obtaining Lists of Registered Nurses

This chapter discusses the procedures used and results obtained in obtaining the names and addresses of nurses currently eligible to practice in the 50 states and the District of Columbia.

Method

This study compiled comprehensive name listings from the nurse licensing departments in each state and the District of Columbia to define the sampling frame. ARI asked the Nursing Data and Analysis unit within the Bureau of Health Professions of the Public Health Service (PHS) to jointly sponsor the development of a name and address listing of working nurses. This unit of PHS

Public Health Service (PHS) to jointly sponsor the development of a name and address listing of working nurses. This unit of PHS has been charged to satisfy legislation requiring periodic data on the number and distribution of nurses by type of employment and location of practice; on the activity status of nurses; on the rates of compensation for nurses; and on the number with advanced training by specialty.6 PHS conducted surveys in 1976, 1980, 1984, and 1988, and was preparing for its next survey. opted not to share their listings. Subsequently, HII established procedures to contact each state and the District of Columbia to acquire lists of civilian nurses. The first step involved obtaining a list of the office, address, and phone number for each State Board of Nursing. An up-to-date mailing list, sans the name of the Executive Directors, was provided to HII by the Quality Assurance office of the Office of the Army Surgeon General.

HII used a five step process used to obtain the names and address lists of registered nurses: (a) introductory letters were sent to each state board, (b) callers were trained, (c) State Boards were contacted, (d) notebooks to document contact and discussion with each state were prepared, and (e) lists were ordered using state procedures.

Introductory letters. A letter was prepared with enclosures to the Executive Director of each State Board of Nursing under the letterhead of the Surgeon General for the Department of the Army. The letter was co-signed by the Chief of the Army Corps of Nurses and the Director of the Manpower and Personnel Research Division of ARI. The letter explained the objectives of the research, solicited the State Board's cooperation, assured full confidentiality of the data, and alerted the Director that an HII representative would contact the Board at a later date. The enclosures to the letter included an abstract providing background on the project, and a summary of the information requirements of the research. The letter and enclosures are presented at Appendix A.

Train callers. Two senior researchers were trained as callers. They contacted the State Boards by telephone to solicit support and to determine procedures for obtaining the lists of RNs. The callers were briefed on the goals of the research project and the specific purpose of this phase of the research. The briefing included instructions on making the initial contacts with the State Boards, making follow-up contacts with technical personnel, and recording the information obtained from the phone

⁶ As reported in the Final Technical Report on Sampling and Statistical Methods (Research Triangle Institute, N.C., March 1989. p.1) for the fourth national sample of registered nurses, Public Laws 94-63 and 94-484 in Title VII of the Public Health Service Act, require continual updates regarding the number, status, earning, and specialties of those in the nursing profession.

been available to researchers in previous surveys, unique features in each state system, and the types of problems encountered in each state.

One specific objective of the training was to warn callers about differences among the different State Boards in terms used to identify RNs eligible to practice. First, the term "active" nurses usually denoted only those actually in practice as an RN. At other times, however, the term "active" nurses was meant to include those who were not currently working as RNs, but were eligible to do so if they desired. Second, the term "currently licensed" usually referred only to RNs whose licenses were currently valid. On the other hand, some states permanently license RNs with the stipulation that their license be periodically certified or registered in order to practice. in many instances, the terms "active" nurses or "currently licensed" accurately denoted the targeted population, that is "nurses eligible to practice." In other cases, however, the terms may have included RNs outside of the specified population-specifically, those who were not working as RNs or whose licenses were not currently valid. Callers were trained to recognize and avoid these terms when they were not strictly in accordance with the technical definition of the target population.

<u>Call State Boards</u>. All 51 State Boards of Nursing were contacted in October and November of 1991. A number of calls were made in December 1991 and January 1992 to follow-up on initial calls or to request more current data.

An initial call was made to the Executive Director of the State Board of Nurses. If the Director was not available, the callers tried to contact a staff person at the Board who could provide the required information. The caller's questions during the initial call were guided by forms that are presented at Appendix B. The purposes of the initial calls were to:

- Determine whether the state would release the name, address, license number, and other data for all RNs licensed in the state;
- · Identify procedures for obtaining the requested information;
- Review the license renewal process to determine the best time for obtaining the most current list of RNs;
- Identify a contact (if not the Director) for obtaining the lists; and,
- Obtain an estimate of the number of RNs licensed in the state.

The callers sought technical information about the content and form of computer-based data to facilitate retrieval from automated sources. Sometimes, this information was obtained from the contact person at the State Board during the initial call.

In many cases, however, a subsequent call was required to obtain the additional information from another staff person at the State Board or from personnel at other state agencies or state universities that maintained RN licensing data for the boards. The data requirement form for this additional information is also presented at Appendix B.

A review of prior surveys indicated that the names and addresses of nurse practitioners were sometimes kept in separate files. Therefore, one specific purpose of the subsequent calls was to establish whether separate files were kept for nurse practitioners or other advanced practitioners (e.g., nurse anesthetists). If the data for advanced practitioners were not included on the RN data base, the callers made a note to order the separate files.

Prepare notebooks. Data requirement forms were developed to remind callers to ask for critical information and to provide a convenient record of conversations. Completed forms were inserted in the notebooks. The callers compiled, maintained, and updated two notebooks that consolidated all information pertaining to the lists. Included in the notebooks were logs of all telephone calls, completed forms, and copies of written correspondence between the caller and the states. Each notebook was organized into sections according to state and contained information on 25 or 26 State Boards (counting the District of Columbia).

Order lists. Once they obtained preliminary information about the lists, the callers then obtained the lists themselves. Because of the higher than anticipated costs of some of the lists (a number of states increased their cost from \$100 to \$5,000), the development of the sampling plan was accelerated. The intent was to order additional data only from states that would be included in the sample. Once the plan was finalized, the callers purchased remaining lists only from the states selected into the sample.

Results of Contact With the States

Lists of RNs were not purchased from every state. However, detailed information on those lists was obtained from the State Boards of 49 states and the District of Columbia. This section summarizes the information from the 50 boards, plus New Hampshire (the only state that could not provide name lists).

Available information. Table 2 summarizes the information available on the RNs. The extent of information differed from state to state. At a minimum, every state with the exception of New Hampshire provided the names and addresses of RNs eligible to practice in their state. The Attorney General of New Hampshire ruled that names and addresses of RNs constituted privacy information and could not be released. Not all states maintained the license number of registered nurses as part of the license renewal database. Some were willing to provide license

numbers for research purposes, whereas other states would not release it. Finally, a few states provided information such as work setting, certifications, position, basic nursing education, and highest education level attained. Unfortunately, they were the exception rather than the rule.

Procedures for obtaining lists. Table 3 summarizes the specific procedures for obtaining names and addresses of RNs from the 50 Boards of Nursing. Most states treated the requests as routine, usually requiring only a written request and prepayment for the data. Some states required the request to be approved by an entity outside of the administrative office of the State Boards--usually a Board of Directors. Some required special forms for ordering or releasing the documents. This documentation sometimes included notarized agreements or affidavits to assure that researchers handled the data in a confidential manner. Although most states required prepayment for the information, some states billed HII for the data. A number of states requested blank replacement tapes.

<u>License renewal procedures</u>. Table 4 summarizes (a) the length of renewal periods, (b) the date when licenses are renewed, and (c) any "grace period" during which RNs could renew their licenses.

In most states, RN licenses are for a two-year period with some states stipulating shorter (one-year) or longer (three-year) renewal periods. In 19 states, the date of renewal is specified according to a pseudo-random procedure, such as renewing in accordance with birth dates or RN license numbers. In practice, this procedure requires states to constantly renew RN licenses throughout the year. In most of these cases, names and addresses are entered into an on-line database that is constantly updated as new information about RNs is received. The callers concluded that the information from these states was sufficiently current for the study purposes.

The remaining 31 states and the District of Columbia renew RN licenses in batches. The callers identified those states renewing licenses during or soon after the period during which the lists were being obtained (i.e., October-November 1991). Of particular interest were the four states that had two-year renewal periods: Delaware, Indiana, New Jersey, and Utah. If the callers had obtained the lists for those states during that period, the information would have been almost two years old. Consequently, the callers delayed their requests until after the files had been updated.

Numbers of nurses eligible to practice. Another specific objective of the phone calls was to estimate the number of RNs currently eligible to practice in each state. Some of the contacts at the State Boards cautioned that their estimates varied widely from month-to-month and even from day-to-day. This was particularly true for the states that renew licenses on a year-round basis and continuously update their data bases.

Table 2
Information Available on RNs

State	Name	Address	License Number	Work Setting	Position	Certifi- cations	Basic Education	Education Level
Alabama	Yes	Yes	NR	Yes	No	No	No	No
Alaska	Yes	Yes	Yes	No	No	No	No	No
Arizona	Yes	Yes	NR	Yes	Yes	No	No	Yes
Arkansas	Yes	Yes	No	No	No	No	No	Yes
California	Yes	Yes	Yes	No	No	No	No	No
Colorado	Yes	Yes	Yes	No	No	No	No	No
Connecticut	Yes	Yes	Yes	No	No	No	No	No
Delaware	Yes	Yes	NR	No	No	No	No	No
District of Columbia	Yes	Yes	Yes	No	No	No	No	No
Florid a	Yes	Yes	Yes	No	No	No	No	No
Georgia	Yes	Yes	NR	No	No	No	No	No
Hawa i i	Yes	Yes	Yes	No	No	No	No	No
I daho	Yes	Yes	No	No	No	No	No	No
Illinois	Yes	Yes	Yes	No	No	No	No	No
Indiana	Yes	Yes	Yes	No	No	No	No	No
I owa	Yes	Yes	NR	Yes	Yes	No	Yes	Yes
Kansas	Yes	Yes	No	No	No	No	No	No
Kentucky	Yes	Yes	NR	NR	No	No	Yes	NR
Louisiana	Yes	Yes	NR	No	No	No	No	No
Maine	Yes	Yes	NR	No	No	No	NR	No
Maryland	Yes	Yes	Yes	No	No	No	No	No
Massachusetts	Yes	Yes	Yes	No	No	No	No	No
Michigan	Yes	Yes	Yes	No	No	No	No	No
Minnesota	Yes	Yes	Yes	No	No	No	Yes	No
Hississippi	Yes	Yes	NR	No	No	No	No	No
lissouri	Yes	Yes	NR	Yes	Yes	Yes	Yes	Yes

(<u>table continues</u>)

Table 2 (cont.)

State	Name	Address	License Number	Work Setting	Position	Certifi- cations	Basic Education	Education Level
lontana	Yes	Yes	NR	Yes	Yes	Yes	Yes	Yes
lebraska	Yes	Yes	Yes	No	No	No	No	No
levada	Yes	Yes	NR	No	No	No	No	No
lew Hampshire	No	No	No	No	No	No	No	No
lew Jersey	Yes	Yes	No	No	No	No	No	No
lew Mexico	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
lew York	Yes	Yes	Yes	No	No	No	No	No
orth Carolina	Yes	Yes	NR	Yes	Yes	Yes	Yes	Yes
lorth Dakota	Yes	Yes	No	No	No	No	No	No
hio	Yes	Yes	No	No	No	No	No	No
)k l ahoma	Yes	Yes	No	Yes	Yes	No	Yes	Yes
regon	Yes	Yes	No	Yes	Yes	Yes	Yes	Yes
ennsylvania	Yes	Yes	Yes	No	No	No	No	No
hode Island	Yes	Yes	Yes	No	No	Yes	Yes	Yes
outh Carolina	Yes	Yes	No	Yes	Yes	Yes	Yes	Yes
outh Dakota	Yes	Yes	No	No	No	No	No	No
ennessee	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
exas	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
tah	Yes	Yes	Yes	No	No	No	No	No
ermont	Yes	Yes	No	No	No	No	No	No
irginia	Yes	Yes	Yes	No	No	No	No	No
lash i ngton	Yes	Yes	Yes	No	No	No	No	No
est Virginia	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
isconsin	Yes	Yes	Yes	No	No	No	No	No
yoming	Yes	Yes	No	No	No	No	No	No

Note. Table entries indicate whether a state maintained the information and could release (Yes), maintained the information but would not release it (NR), or did not maintain the information on the nurses as part of the lists or data bases (No).

Table 3
Summary of Procedures Required to Obtain Lists of RNs

State	External Approval Required	Special Documentation	Prepay- ment Required	Blank Tape ^a Requested
A Labama	No	Request Form	Yes	N/A
Alaska	No	No	Yes	N/A
Arizona	No	Order Form	Yes	No
Arkansas	No	No	Yes	No
California	No	List Request	Yes	No
Color ado	No	No	Yes	Yes
Connecticut	No	No	Yes	No
Delaware	No	No	Yes	N/A
District of Columbia	No	No	Yes	Yes
Florida	No	No	Yes	No
Georgia	No	No	Yes	Yes
Hawa i i	No	No	Yes	N/A
I daho	No	No	Yes	N/A
Illinois	No	No	Yes	Yes
Indiana	No	Agreement Release	No	Yes
lowa	No	Purchase of Roster Agreement	No	No
Kansas	No	Request for Record	No	No
Kentucky	No	No	Partial	No
Louisiana	No	No	Yes	N/A
Maine	No	No	No	N/A
Maryland	No	No	Yes	Yes
Massachusetts	No	No	Yes	No
Michigan	No	No	Yes	No
Minnesota	No	No	Yes	No
Mississippi	No	Order Form	Yes	N/A
Missouri	Board	No	No	Yes

(<u>table</u> <u>continues</u>)

Table 3 (cont.)

State	External Approval Required	Special Documentation	Prepay- ment Required	Blank Tape ^a Requested
Montana	Board	Waiver	No	N/A
Nebraska	No	Order Form	Yes	No
Nevada	No	No	No	N/A
New Hampshire	b	b	b	b
New Jersey	Board	No	Yes	Yes
New Mexico	No	No	Yes	N/A
New York	NYS Ed. Dept.	Affidevit	Yes	Yes
North Carolina	Board	Letter of Agreement	Yes	No
North Dakota	No	No	No	N/A
Ohio	Board	No	No	No
Ok l ahoma	No	Contract Letter	Yes	No
Oregon	No	Order Form	Yes	No
Pennsylvania	No	No	No	No
Rhode Island	No	Release of Records	Yes	N/A
South Carolina	Board	No	Yes	Yes
South Dakota	No	No	Yes	No
Tennessee	No	No	Yes	No
Texas	No	No	Yes	Yes
Utah	No	Confidentiality	Yes	Yes
Vermont	No	Invoice	Yes	N/A
Virginia	No	No	Yes	No
Washington	No	No	Yes	Yes
West Virginia	Yes	No	Yes	N/A
Wisconsin	No	No	No	No
Wyoming	No	Order Form	Yes	N/A

a. This question is not applicable (N/A) for those states that provided the information on diskette or on a paper printout.

b. Names and addresses of RNs in New Hampshire were not releasable.

Table 4
Summary of License Renewal Process by State

State	Length of Renewal Period	Date of Renewal	Grace Period
\ Labama	2 years	Oct even years	None
Alaska	2 years	Dec 1 even years	2-3 months
 Vrizona	2 years	Dec 31 even years	None
Arkansas	2 years	IAW birth date & year	None
California	2 years	IAW birth date	None
Colorado	2 years	Sep 30 every year	None
Connecticut	1 year	IAW birth month	90 days
Delaware	2 years	Dec 31 odd years	1 month
District of Columbia	2 years	Jul 1 even years	2 months
Florida	2 years	April odd years	None
Georgia	2 years	Dec 31 even years	None
lawa i i	2 years	June 30 odd years	None
Idaho	2 years	Aug 31 odd years	None
Illinois	2 years	May 31 even years	None
Indiana	2 years	Oct 31 odd years	2 months
loua	3 years	IAW birth month & year	30 days
(ansas	2 years	IAW birth month & year	None
Centucky	2 years	Oct 31 even years	None
ouisiana.	1 year	Dec 31 every year	None
laine	1 year	IAW birth date	None
taryland	1 year	IAW birth month	30 days
lassachusetts	2 years	IAW birth date even years	None
lichigan	2 years	Mar 31 every year	None
linnesota	2 years	IAW birth month & year	None
lississippi	2 years	Dec 31 even years	None
fissouri	1 year	Apr 30 each year	30 days (<u>table</u> contin

Table 4 (cont.)

State	Length of Renewal Period	Date of Renewal	Grace Períod
Montana	1 year	Dec 31 every year	None
Nebraska	2 years	Dec 31 even years	30 days
Nevada	2 years	IAW birth month & year of original license application	None
New Hampshire	2 years	IAW birth day & year of original license application	None
New Jersey	2 years	Dec 31 odd years	None
New Mexico	2 years	IAW birth month	None
New York	3 years	Apr 30 1989, 92, 95	None
North Carolina	2 years	Oct 31 every year	Dec 31
North Dakota	1/2 years ^a	Dec 31 every year/year of original license application	None
Ohio	? years	Aug 31 odd years	None
Ok l ahoma	2 years	Jun 30 even years	None
Oregon .	2 years	IAW birth date & year	None
Pennsylvania	2 years	Apr 30/Oct 31 every year	None
Rhode Island	2 years	Mar 1 on odd/even years IAW license numbers	1 month
South Carolina	1 year	Jan 31 every year	None
South Dakota	2 years	IAW birth date & year of original license application	None
Tennessee	2 years	Dec 31 even years	Mar 1
Texas	2 years	IAW birth date & year	None
Utah	2 years	Dec 31 odd years	30 days
Vermont	2 years	Mar 31 odd years	None
Virginia	2 years	IAW birth month & year	None
Washington	1 year	IAW birth date	None
West Virginia	1 year	Nov 30 every year	None
Wisconsin	2 years	Mar 1 even years	None
Wyoming	2 years	Jun 30 even years	Aug 29

Note. "IAW birth month/day & year" means renewed by end of birth month on odd or even year corresponding to year of birth.

a. ND is currently in transition from 1- to 2-year renewal period.

However, HII found the differences over a four month period were fairly minor. The numbers provided telephonically in November added to 2,533,300; the numbers derived primarily from the obtained lists in late December and January totaled 2,532,267 -- a difference of 1,033, or only 0.04 percent.

The numbers compiled from the lists are summarized in Table 5 and compared with 1988 estimates. The numbers indicate that RNs eligible to practice increased from 1988 to 1991 by 7.1 percent nationwide. Larger increases were seen in the West (particularly in the Northwest) and in the Southeast. Decreases in RN populations were experienced in a few of the New England states (Connecticut, Massachusetts, and New Hampshire) and in the Midwest (Illinois and Iowa). This pattern of change is largely consistent with recent demographic trends. Exceptions to these trends were:

- Alabama and Wyoming, which showed smaller than average gains in RN licenses; and,
- Alaska and Colorado, which showed actual declines in RN populations.

Cost and format of data. The preferred method was to obtain state data on tapes. However, as shown in Table 6, only 32 states were able to supply the data on tapes. Five states provided data on floppy diskette, and 13 provided some form of printed output. North Dakota, included in the sample, provided hardcopy only. This required KII to select the nurse addresses to include in the nurse sample and keystroke in the names and addresses of 1,086 nurses.

Based on information obtained from the State Boards, the total cost for obtaining information would have been \$22,709. This represents a striking increase in the \$11,988 paid by Research Triangle Institute (RTI) to obtain the same data in 1988. Although some increase in cost was expected, the size of the increase was not.

If data were ordered from every state, three states (California, Massachusetts and Minnesota) would have accounted for about 40% of the 1991 total. Conversely, three states (Hawaii, Indiana, and Maine) provided the information free of charge. The fees that State Boards charged for the data ranged from \$0 to \$4,800, with the median fee being \$174. Because we also purchased lists from states not included in the survey, actual costs were \$12,834.

One obvious source of variance in the costs was the large differences among states in their RN populations. To compute charges independent of the size of states, the costs were computed per individual name. This prorated value still showed considerable variability, ranging from 0.0¢ to 5.2¢ per name with a median value of 0.8¢.

Table 5
Comparison of Estimated Number of Nurses in 1988 and 1991

State	1988	1991	Percent Change
Alabama	29,840	31,261	4.8
Alaska	4,568	4,400	-3.7
Arizona	32,782	40,000	22.0
Arkansas	17,428	20,758	19.1
California	206,358	219,848	6.5
Colorado	33,730	32,588	-3.4
Connecticut	49,326	39,134	-20.7
Delaware	8,438	10,000	18.5
District of Columbia	15,783	18,500	17.2
Florida	103,736	115,000	10.9
Georgia	46,672	56,850	21.8
Hawaii	8,732	10,397	19.1
Idaho	7,387	8,636	16.9
Illinois	122,064	108,401	-11.2
Indiana	50,034	57,843	15.6
Iowa	30,609	30,000	-2.0
Kansas	22,840	26,664	16.7
Kentucky	25,987	30,713	18.2
Louisiana	26,999	32,000	18.5
Maine	13,690	14,521	6.1
Maryland	48,769	52,000	6.6
Massachusetts	113,816	93,000	-18.3
Michigan	94,413	102,168	8.2
Minnesota	42,501	47,000	10.6
Mississippi	16,457	19,086	16.0
Missouri	50,906	57,000	12.0

(table continues)

Table 5 (cont.)

State	1988	1991	Percent Change	
Montana	8,300	9,848	18.7	
Nebraska	16,525	16,870	2.1	
Nevada	7,219	9,891	37.0	
New Hampshire	17,117	16,000	-6.5	
New Jersey	88,966	106,000	19.1	
New Mexico	9,682	11,300	16.7	
New York	219,898	225,000	2.3	
North Carolina	51,196	62,967	23.0	
North Dakota	6,636	7,050	6.2	
Ohio	111,920	127,000	13.5	
Oklahoma	22,453	24,000	6.9	
Oregon	26,850	31,000	15.5	
Pennsylvania	168,551	178,134	5.7	
Rhode Island	13,322	14,500	8.8	
South Carolina	19,841	23,500	18.4	
South Dakota	7,503	8,290	10.5	
Tennessee	40,811	46,000	12.7	
Texas	111,174	125,000	12.4	
Utah	9,672	13,112	35.6	
Vermont	6,828	7,000	2.5	
Virginia	57,279	63,487	10.8	
Washington	45,262	49,588	9.6	
West Virginia	16,904	19,962	18.1	
Wisconsin	50,647	55,000	8.6	
Wyoming	3,746	4,000	6.8	
TOTALS	2,339,714	2,532,267	8.2	

Table 6
Format and Cost of Data Provided by State Boards

State	Format	Cost (in Dollars)	Cost/Name (in Cents)	Ordered	Date Received
Alabama	Printout	640	2.0	Y	12/06/91
Alaska	Directory	20	0.5	Y	11/06/91
Arizona	Tape	430	1.1	Y	12/04/91
Arkansas	Tape	55	0.3	Y	11/19/91
California	Tape	2,238	1.0	Y	12/23/91
Colorado	Tape	78 5	2.4	Y	12/23/91
Connecticut	Tape	90	0.2	Y	12/03/91
Delaware	Printout	40	0.4	Y	
District of Columbia	Tape	183	1.0	Y	12/01/91
Florida	Tape	190	0.2	Y	11/26/91
Georgia	Tape	573	1.0	Y	12/23/91
Hawaii	Printout	0	0.0	Y	
Idaho	Diskette	7 5	0.9	Y	11/26/91
Illinois	Tape	216	0.2	Y	11/25/91
Indiana	Tape	0	0.0	Y	12/21/91
Iowa	Tape	53	0.2	Y	01/02/92
Kansas	Tape	290	1.1	Y	12/23/91
Kentucky	Tape	49	0.2	Y	11/27/91
Louisiana	Labels	640	2.0	N	
Maine	Printout	0	0.0	Y	12/01/91
Maryland	Tape	35	0.1	Y	12/11/91
Massachusetts	Tape	4,800	5.2	N	
Michigan	Tape	763	0.7	Y	11/27/91
Minnesota	Tape	2,000	4.3	N	
Mississippi	Diskette	600	3.1	Y	01/02/92
Missouri	Tape	818	1.4	N	
Montana	Diskette	293	3.0	N	
Nebraska	Printout	115	0.7	Y	11/19/91

(table continues)

Table 6 (cont.)

State	Format	Cost (in Dollars)	Cost/Name (in Cents)	Ordered	Date Received
Nevada	Printout	79	0.8	Y	11/18/91
New Hampshire	a	a	a	N	
New Jersey	Tape	165	0.2	Y	01/06/92
New Mexico	Diskette	478	4.2	Y	
New York	Tape	30	0.0	Y	11/27/91
North Carolina	Tape	794	1.3	Y	11/22/91
North Dakota	Printout	120	2.0	Y	02/15/92
Ohio	Tape	150	0.1	Y	01/29/92
Oklahoma	Tape	55	0.2	Y	11/27/91
Oregon	Tape	70	0.2	Y	12/11/91
Pennsylvania	Tape	987	0.6	Y	11/12/91
Rhode Island	Printout	140	1.0	Y	12/01/91
South Carolina	Tape	500	2.1	Y	12/09/91
South Dakota	Tape	40	1.1	Y	11/18/91
Tennessee	Tape	100	0.2	Y	11/20/91
Texas	Tape	200	0.2	Y	12/06/91
Utah	Tape	150	1.1	N	
Vermont	Diskette	75	1.1	Y	
Virginia	Tape	505	0.8	Y	11/12/91
Washington	Tape	800	1.6	Y	02/10/92
West Virginia	Labels	898	4.5	N	
Wisconsin	Tape	247	0.4	Y	11/05/91
Wyoming	Printout	64	1.6	Y	11/22/91

Total for lists ordered (as of Jan. 31, 1991)

\$ 12,834.

a. Information from New Hampshire was not releasable in any format or at any cost.

These marked increases in costs were probably due to pressure from the state either (a) to bring the costs of the services in line with actual costs, or (b) for the service to generate revenues for the state. With the present economic conditions, there is no reason to expect that these pressures will lessen. In terms of future surveys, the costs will probably continue to increase; but the present data indicate that the amount or pattern of increase will be difficult to predict.

Screening the State Tapes. Upon receipt, the tapes were processed and screened. Standard tape analysis (STANALS) verified tape characteristics. Original tapes were copied onto scratch tapes. Outputs of the copy were reviewed to determine potential problems with the tapes (e.g., bad tracks) and the number of observations.

Initial read programs were written and executed for each state on 100 observations to test the program and produce the dataset. Since the original population is of tremendous importance when drawing samples, special care was taken to ensure that the data included all cases of analytic interest. This was done by reviewing the documentation accompanying each tape, discussing questions with points-of-contact, and, where necessary, running frequencies on relevant variables. The tapes from the state of California were rejected twice. Its first tape excluded nurse practitioners and nurse anesthetists. The second tape included only nurses who resided in California, as opposed to nurses registered in California. HII contacted the technician in California to quite specifically explain what was required. the exception of California, final read programs were written and executed for each state. A random sample of 1,086 observations was drawn for each state and written onto tape. These observations were converted to the survey mailing list.

<u>Mailing Labels for Registered Nurses</u>. HII produced mailing labels for the primary samples, and supplemental samples to compensate for non-respondents. Pressure-sensitive mailing labels were produced along with hard copy and floppy disks using WordPerfect 5.1.

Mailing Lists of Schools of Nursing. Obtaining individual names and addresses of student nurses was not feasible. The most efficient manner to gain access to nursing students was through the nursing school administrations. As a first step, mailing labels addressed personally to the Deans of Nursing from over 600 colleges and universities was obtained from the American Association of Schools of Nursing. Letters were sent on 14 March 1992 to the schools of nursing. The letter asked each school to complete a short questionnaire indicating its willingness to participate in the program. A copy of the letter is contained in Appendix D.

Through the end of April 1992, 80 percent of the approximately 300 schools who responded indicated they would permit administration of the survey. A follow-up letter was sent on 18 May 1992 to non-respondants, requesting their response and support. Upon receipt of the final set of responses, the sampling plan outlined previously will be used to select schools that will participate in the survey.

Developing the Survey Instruments

A major task was to develop a survey instrument that would facilitate comparisons with an in-Service nurse survey, and that would meet the needs of Active and Reserve Components managers of nursing programs. A meeting was held on the 16th of September, 1991 at ARI with representatives from ARI, USAREC, the Army Nurse Corps, and nursing representatives from the Army Guard, Army Reserve, Walter Reed Army Medical Center, Department of the Army (DA) staff, and HII. A decision was made that the survey should help determine what attracted an individual to nursing, his or her level of satisfaction with various aspects of the nursing profession, awareness and perceptions of Army nursing, and what might attract him or her to the Army.

Prior to developing survey questions, HII gathered information on issues affecting nursing in the civilian and military sector. Examples of information collected included:

- Briefings and reports. Copies of the Nurse Action Plan published by the ANC and briefings prepared by ANC and USAREC were collected. We also gathered the Health and Human Services (HHS) "Seventh Report the President and Congress on the Status of Health Personne. in the United States" (1990), the HHS "Secretary's Commission on Nursing" report (1988) and the Naval Postgraduate School's report, "Recruiting and Retaining Army Nurses: An Annotated Bibliography, 1990" (Thomas, et. al, 1990). In addition, HII obtained a bibliography of health professional reports filed in the Defense Technical Information Center (DTIC), and the Center for Naval Analyses' report, "Medical and Nurse Corps Strategy" (Cooke, 1990).
- Results of Surveys. We reviewed survey reports and survey instruments for surveys such as the USAR Nurse Satisfaction and Retention Survey, the HHS Survey of the Registered Nurse Population (1988), The Army Nurse Survey (TANS). The Survey of Total Army Military Personnel) (STAMP), the physicians and dentists survey "Desert Storm and Military Medicine", and the Air Force Health Professions Officer Survey Report (1989).

After reviewing the literature, we met separately with ARI, ANC, and USAREC nurse recruiting officials to gain a deeper appreciation of nursing issues. We then developed an item data bank for the nurse and student nurse survey instruments. The data banks were forwarded for review and comment to USAREC, ARI, and the ANC. The purpose of the review was to remove those

The time to ranged from 22 to 30 minutes. The students were quite candid and helpful in suggesting changes to the survey. Most suggestions dealt with clarifying terminology. Subsequently, a modified version was administered to the Catholic University students. They felt comfortable with the second prototype and made a number of suggestions to further strengthen the instrument.

Arrangements for administering the prototype survey to registered nurses were more complex. Local hospitals were contacted to solicit their support in obtaining volunteers to take the survey. None of the hospital directors of nursing had the authority to grant immediate approval. The Nursing Director at each hospital obtained permission from the governing boards through the various hospital administrators... a process that took a number of months. Approval was eventually given at the two hospitals. The nurses completed the survey in under 30 minutes. They were satisfied with the prototype survey questions and format. Only three suggestions were made that clarified the question or added responses to a question. Copies of the nurse and nurse student prototype surveys are at Appendix E and F.

Preparing the OMB Package

A draft Office of Management and Budget (OMB) approval package was prepared and submitted to the points-of-contact in ARI, USAREC, and the Army Nurse Corps. Standard Form 83A instructions, "Request for OMB Review" was used in completing the package.

The OMB package consisted of a full description of the justification for the conducting survey. The justification included a description of why other sources of the information were not available. The OMB package explained attempts to reduce the burden on respondents by using improved technology. It also explained how we proposed to avoid duplication with other sources and obtain information as efficiently as possible.

The OMB package provided a description of the technical abilities of the people who developed the sampling plan, designed the survey, and analyzed the data. The experience of the personnel cited served to testify to the technical capabilities of the staff, as well as the study's ability to provide the information required for program evaluation. In addition, we completed all the required paperwork that accompanies the approval package, including calculation of burden per respondent and total burden hours.

As required by OMB, a copy of the registered nurse and nursing student prototype survey instruments were enclosed in the package. The final draft of the OMB package was approved for submission in mid-May 1992. Submittal of the OMB package completed requirements for this phase of the project. Documentation of study completion and results will be in an ensuing technical report.

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APPENDIX A

LETTER TO STATE BOARDS OF NURSE LICENSING



DEPARTMENT OF THE ARMY
OFFICE OF THE SURGEON GENERAL
5100 LEESBURG PIKE
FALLS CHURCH, VA 22041-3258



Office of the Chief Army Nurse Corps

7 October 1991

Executive Director

Dear Executive Director:

The United States Army Research Institute for the Behavioral and Social Sciences (ARI), in conjunction with the Army Nurse Corps, is conducting a national survey of registered nurses (RNs) and nursing students. In addition to demographic and employment characteristics gathered in prior surveys of RNs, this survey will solicit information about attitudes and perceptions toward the nursing profession and perceptions of Army nursing. The data will provide information at the national and State levels. The information will provide a baseline for comparative analyses as part of an overall review of Army Nurse Corps programs and compensation levels. The study report will be available to interested parties in the private and public sectors.

We are now requesting your assistance in identifying the sample for the survey. An effective sample requires a list of all actively licensed RNs in each State. As with past national surveys we have conducted, the date will be used only to fulfill the requirements of the study. No other uses will be made of the information. The data will be kept confidential and handled in accordance with the Privacy Act. When the requirements of the study have been met, all individual survey questionnaires will be destroyed.

The state listings and appropriate supporting information will be collected by the Human Resources Research Organization, International, Inc. (HII). HII and its parent nonprofit company (HumRRO) have been involved in numerous human resource studies over the past 40 years. There are two enclosures to this letter. The first outlines the information we are seeking; the second provides an abstract that explains the purpose of the survey.

-2-

We sincerely appreciate your cooperation on this important effort. If you have any questions, please contact either Mr. Pat Lerro, the HII Project Director at (703) 706-5649, or the ARI contractor monitor Dr. Naomi Verdugo, of the Manpower and Personnel Policy Research Group (ARI), at (703) 274-5610.

Nancy R. Adams Colonel(P), AN

Chief, Army Nurse Corps

(Designee)

2 Enclosures (w/b)

Lta M. Simutis birector, Manpower and Personnel Research Laboratory, U.S. Army Research Institute

APPENDIX B

FORM FOR OBTAINING ADDITIONAL TECHNICAL INFORMATION

1.	Today's date:
2.	State:
3.	Organization supplying data:
	Name:
	Address:
	Telephone:
4.	In what form will the list of RNs be provided? (Check one.) (If the state says hard
	copy, ask whether the data is also on disk or tape and try to obtain a copy in that
	mode.)
	Computer tape Computer printout Disk
	Other (specify):
5.	What type of currently licensed RNs are on the file? (Check all that apply.)
	Renewals
	Reinstatements
	First-time licenses
	Nurses licensed in state but living out-of-state
6.	Does the file contain any non-RNs or RNs who are not currently eligible to
	practice? Yes No
	If yes, how are those currently eligible to practice identified?
7.	What is your best estimate of the number of RNs currently eligible to practice in
	your state?
8.	Do you have a grace period for late renewals? Yes No
	If yes, what is it?
9.	As of what date is your file of RNs current?
10.	How frequently is the file updated?

11.	Are the RNs' license numbers on the file? Yes No
IF T	HE FILE IS ON COMPUTER TAPE, PLEASE COMPLETE THE FOLLOWING
12.	Please provide the following information concerning your tape.
	a. Tape label (external, VOL=SER):
	b. Density (BPI): 6250 1600 800
	c. Recording Mode: EBCDIC ASCII BCD
	d. Internal labeling: none labelled
	e. Number of Tracks:
	f. Logical record length: Number of records per block:
	Block size:
	g. Record format (FB, for fixed block, for example):
	h. Sequential tape label on which file is located:
	i. Data set name (DSN), if any:
13.	How are RN records ordered on the file?
	Alphabetically, by the last name and then by first name for nurses
	with same last name
	License number
	Social Security Number
	Other (please describe):
14.	How are RN names formatted?
	Last and first (or last, first and middle) names in separate
	fields (i.e., formatted)
	Free form with last name first
	Free form with first name first
	Other (please describe):
15.	How are names of member of religious order kept in the file?
	Kept under "Sister," "Brother," "Mother," or "Father" or similar
	abbreviation
	Kept by first name
	Kept by last name
	Other (specify):

10.	which of the following appreviations for members of religious ofders appear of
	your file? (Check all that apply.)
	br broth sis sr mo
	fr Other (please describe):
17.	Are there any other special titles on the file that we need to be aware
	of? Yes No
18.	Are names ever recorded with commas, apostrophes, dashes, imbedded blanks, or
	similar punctuation? Yes No
19.	Is a printout of sample records enclosed? Yes No
20.	Is tape documentation enclosed? Yes No
21.	Please provide the name and phone number of the data processing person to
	contact if questions about the tape file arise:
	Name:
	Phone:

THANK YOU FOR YOUR COOPERATION.

APPENDIX C

FORM FOR OBTAINING INFORMATION FROM INITIAL CONTACT

	from U.S. Army Surge	eon General's office?	YES NO
3. Person Preparir	ng Data:		
Name:			
Title:		_	
		to practice in the state:	
	ng data (a) in files and		
		Releasable	
Name	YES NO	YES NO	
Address	YES NO	YES NO	
License No.	YES NO	YES NO	
Work Setting	YES NO	YES NO	
Position	YES NO	YES NO	
	ACC NO	YES NO	
Certifications	YES NO		
Certifications	on YES NO	YES NO	
Certifications Basic Education			

7. Are the data available on tape or disk? TAPE DISK
8. Is there a charge for the data? YES (\$) NO
9. To whom should the check be made out?
Name:
Address:
10. Do we need to send a blank tape? YES NO
If yes, to whom?
Name:
Address:
11. Is a purchase order required? YES NO
If yes, to whom should it be sent?
Name:
Address:
12. Do you require a confidentiality statement? YES NO
13. Does the board need to approve the release of this information? YES NO
If yes, when do they meet?
14. Please describe the licensing and renewal process in your state with
respect to the licensing period.
Length of licensing period:
Date of renewal:

- 15. Is there a grace period? YES NO If yes, how long?
- 16. Verify the mailing address.

APPENDIX D

LETTER TO DEANS OF SCHOOLS OF NURSING



DEPARTMENT OF THE ARMY OFFICE OF THE SURGEON GENERAL 5100 LEESBURG PIKE SALLS CHURCH, VA 22041-3258



Office of the Chief Army Nurse Corps

12 March, 1992

Donna Hartweg, PhD, Director Illinois Wesleyan University School of Nursing Box 2900 Bloomington, IL 61702

Dear Dr. Hartweg:

The United States Army Research Institute for the Behavioral and Social Sciences (ARI), in conjunction with the Army Nurse Corps, is planning to conduct separate national surveys of registered nurses (RNs) and nursing students. Depending upon clearances from the Office of Management and Budget (OMB), the surveys will be conducted during the Fall 1992 time-frame. In addition to demographic and employment characteristics, the surveys will provide national and State level information about attitudes and perceptions toward the nursing profession, as well as toward Army nursing. The information will provide a sound baseline to those involved in researching nursing issues. The information will also form the basis for comparative analyses for the Office of the Army Surgeon General in its review of Army Nurse Corps programs and compensation levels. The study report will be available at no charge to interested parties in the private and public sectors.

As with past national surveys we have conducted, the data will be used only to fulfill the requirements of the study. The data will be kept confidential and handled in accordance with the Privacy Act. When the requirements of the study have been met, all individual survey questionnaires will be destroyed.

Directors of State Boards of Nursing Registration/Certification have cooperated in this effort by providing a list of all actively licensed RNs in each state. Schools of Nursing at a number of universities have helped in developing the nurse student survey instrument. We are now soliciting your support in developing the sample of nursing students. The sample will include juniors, seniors, and those nursing students who have four-year degrees in other disciplines, but are now enrolled in a nursing program.

There are three enclosures to this letter. The first is a short questionnaire we ask you to complete. It outlines the data we seek to structure the sample and the survey, and it requests your opinion of two alternative ways to collect the data. The second is an abstract that explains the purpose of the survey. The third is a prototype of the survey. The data will be collected by the Human Resources Research Organization, International, Inc. (HII).

We sincerely appreciate your cooperation on this important effort. If you have any questions, please contact either Mr. Pat Lerro, the HII project director at (703) 706-5649, or the ARI contract monitor Dr. Tanya Guthrie, of the Manpower and Personnel Policy Research Group of the Army Research Institute (ARI), at (703) 274-5610.

Nancy R. Adams

Brigadier General, AN

Chief, Army Nurse Corps

3 Enclosures (w/b)

Lita M. Simutis

Director, Manpower and Personnel

Research Laboratory, U. S. Army Research

Institute

APPENDIX E

THE U.S. ARMY SURVEY OF REGISTERED NURSES

HumRRO International, Inc.	APPROVED OMB NUMBER
66 Canal Center Plaza, Suite 400	EXPIRES:
Alexandria, VA 22314	

The U.S. Army Survey of Registered Nurses

HumRRO International, Inc. 66 Canal Center Plaza, Suite 400 Alexandria, VA 22314.

AUTHORITY: Public Law 93-573, called the Privacy Act of 1974, requires that you be informed of the purpose and uses to be made of the information that is collected. The Federal Government may collect the information requested in the 1992 Survey of Registered Nurses under the authority of 10 United States Code 137, 503, 2358.

PRINCIPAL PURPOSE: This survey is being conducted to help the Federal Government learn more about the beliefs of nurses regarding various aspects of their profession, as well as their knowledge and views of the Army Nurse Corps (ANC). Your responses will aid the ANC as it evaluates various programs and policies. In addition, the results of this survey will provide insight into a number of work-related and professional issues confronting nurses today.

DISCLOSURE: Providing information in this questionnaire is voluntary. You do not have to answer particular questions if you choose not to. The information you give us is protected under the Privacy Act of 1974. Your answers will be kept confidential and your identity will never be known to anyone. This is not a test. There are no right or wrong answer, so please be as honest as you can about your feelings.

ROUTINE USES: Information on individual respondents will not be released to other agencies or institutions. Only group statistics will be reported in the findings from this project. Copies of the final report will be provided to the Office of the Army Surgeon General, the Army Nurses Corps, and Army personnel and research agencies. The contractor and the Army will produce in-house publications on overall results. In some cases manuscripts of findings will be presented at conferences, symposia, scientific meetings, and in professional journals.

APPROVED OMB	NUMBER
EXPIRES:	

Public reporting burden for this collection of information is estimated to average 30 minutes per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, to Department of Defense, Washington Headquarters Services, Directorate for Information Operations and Reports, 1215 Jefferson Davis Highway, Suite 1204, Arlington, VA 22202-4302, and to the Office of Management and Budget, Paperwork Reduction Project, Washington, DC 20503. Please DO NOT RETURN your (form/questionnaire) to either of these addresses. Send your completed (form/questionnaire) to:

HumRRO International, Inc. 66 Canal Center Plaza, Suite 400 Alexandria, VA 22314.

INSTRUCTIONS FOR MARKING

- . Use only a <u>soft lead</u> pencil (a standard No. 2 is ideal.)
- . Make heavy marks that fill the circle.
- . Erase cleanly any answer you wish to change.
- . Make no stray markings of any kind. Please write any comments on a separate sheet of paper.
- . Fill in only one circle for each question unless you are told to "mark all that apply"
- . Where numbers are called for in an answer, first write your answer in the boxes provided and then fill in the circles underneath which represent the numbers you have placed in the boxes.

EXAMPLE A:

How old were you on November 4, 1992?

21

Years

EXAMPLE B:

Will marks made with ballpoint pen or felt-tip pen be properly read?

o Yes

e No

بإ	(excitound				
١.	Are you ?		6.	What race do you c	onsider yourself? (Mark only one)
	FemaleMale			O White O Black O Indian	Eskimo or AleutAsian or Pacific IslanderOther
2	What is your month and	d year of birth?		(American)	
	Month (0 0 Yes	ar 1900 000 000 000 000 000 000 000 000 000	7.	Are you of Spanish O No O Yes (Mexican, Mexican-Americ Chicano) O Yes (Puerto Ric	O Yes (Cuban) O Yes (Other Spanish, can, Hispanic)
3.		native born or naturalized)?			
	O No (Skip to end of s	survey)			
4.	What is your current m	narital status?			
	MarriedWidowed	O Divorced or separated O Never married			
5	Do you have a child or	children living at home with y	ou (on a full- or part-time	basis?
	O NO				
	O YES-	5a. Are these of	:hild	ren	

All less than 6 years old?All 6 years old or older?Both younger and older than 6 years?

Education

8	Are you currently enrolled in a formal education program leading to a Baccalaureate or higher degree in nursing							
	O No (Skip to Question 9) O Yes							
	8a. Are you considered a full-time or 8b. What degree are you currently working toward? part-time student?							
	O Full-time student O Part-time student O Part-time student O Baccalaureate O Doctorate O Master's O Other (Specify)							
	8c. How are your tuition and fees being financed? (Mark all that apply)							
	 Personal and family resources Employer tuition reimbursement plan (including Veterans Administration tuition) Federal traineeship, scholarship, or grant O State or local government loan or scholarship Non-government scholarship, loan, or grant O University teaching or research fellowship O Other sources (Specify) 							
9	What nursing degree did you have when you first became a registered nurse?							
	O 2 year Associate degree O 3 year Diploma O Master's degree							
10.	Please fill in the circles corresponding to the month and year that you received this degree. Month Year 19 Year 19 Year 20 20 20 30 30 40 40 40 50 50 50 50 60 60 60 70 70 70 80 80 80 80 90 90 90 90 90 9							
11.	Since graduating from the nursing program you described in Question 9, have you earned any additional degrees? O No							
	O Yes							

12	What is your n	agnest level of	education?				
	O 3 year Dipl O Baccalaure	sociate degree Ioma sate degree (B agree in nursing		equivalent)	O Doctora	s degree, non-nursing ate in nursing ate, non-nursing	
13.	What is the one primary focus of your highest nursing degree? (Mark only one answer)						
	O Clinical pra O Education	•	O Supervi O Researd O Other	sion/administrat ch	ion		
14.	If the primary your highest d	focus of your h degree was clin	nighest deg nical practic	ree was not clini e specify the typ	cal practice e. (Mark or	, skip to question 15. If the primary one answer)	r focus of
	O Focus was	not clinical pra	actice				
	O Maternal-c O Midwifery	/Gerontology		O Anesthesia O Psychiatric- O Family pract O Critical care O Operating R O Other	mental hea tice e		
15.	Are you profes	ssionally certific	ed by a nat	ional accrediting	body in a	defined functional or clinical area of	nursing?
	O No O Yes 15a.Are you certified as a: (Mark all			(Mark all that a	ppiy)		
	 Certified registered nurse Certified nurse-midwife Clinical specialist, adult p Clinical specialist, child, a mental health Clinical specialist, commu Clinical specialist, geronto Clinical specialist, medical Neonatal nurse clinician p 		psychiatric/mer adolescent psyc nunity health nurs tological nursing al-surgical nursing	chiatric/ sing	 Adult nurse practitioner Family nurse practitioner Gerontological nurse practitioner Ob-Gyn nurse practitioner Pediatric nurse practitioner School nurse practitioner Other (Specify) 	-	

1 Most Important Resson	2 2nd Most Important Resson	3 3rd Most important Resson					
0_	0	0	To can	e for/help pe	eople		
0_	0	0	Profes	sional respe	ct		
0_	0	0	Job se	curity			
0	0	0	Interes	ting job			
0	0	0	Wanted	d active han	ds on profes	sion	
0	0	0	To gair	n technical e	xperience		
0	0	0	To gair	leadership	experience		
0	0	0	Sense	of independe	nce		
0	0	O	Degree	of decision	making auth	hority	
0	0	0	Broad	range of pra	ctice opport	runities	
0_	0	0	Improv	e salary lev	ei		
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O Not Ap O Better O Better O Better O More	e employed full-tim	ne before entering? (Mark all that ap	the nursing proppy.) nority arding ningful				ursing would t
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better that Not Ap Better Better Better More More More High school	e employed full-time the job you had? pplicable, I wasn't experience work schedule benefits autonomy interesting influence did each counselor	emiployed full-time More autt More rewa More invol Other h of the following h	nority arding living Positive Influence	ecision to pu	rsue a nursir Negative Influence	ng career? Does Not Apply	ursing would b
better that Not Ap Better Better Better More More More High school Nursing pro Friend(s)	e employed full-time the job you had? pplicable, I wasn't experience work schedule benefits autonomy interesting influence did each counselor fessor.	employed full-time More auth More rewa More mea More invol Other h of the following h	nority arding living living large on your de larguence	ngram, in who	rsue a nursir Negative Influence	ng career? Does Not Apply	ursing would l

		Positive Influence	No Influence	Negative Influence	Does Not Apply
	Nurse courselor	_0	O	0	0
	Parent(s)	_0	0	0	0
	Chid(ren)	_0	0	0	O
	Spouse or significant other	_0	0	0	O
	Brother(s)/sister(s)	_0	0	0	0
	College professor (non-nursing)	_0	0	0	0
	Media advertisment.		O	0	0
	Family tradition	O	O	0	O
	Other influences	O	O	O	O
	When were you issued your first U.S. license to produce to Columbia) Year of first U.S. license: 19 ① ① ② ② ③ ③ ④ ④ ⑤ ⑤ ⑥ ⑥ ⑦ ⑦ ⑧ ⑧ ⑨ ⑨ ⑨ ⑨	·	registerea i	nurse (by on	e of the 50 States of the
20.	Are you currently employed in the nursing professi O No (skip to Question 32) O Yes	on?			

Employment

New Hempshire New Jersey New Mexico New York North Carolina North Daketa Othio Okiahome Oregon	700000 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0	
New Jersey New Mexico New York North Carolina North Dakota Othio Oklahoma Oragan	2 2 2 2 2 3 3 3 3 4 4 4 4 5 5 5 5 6 6 6 6	
New York North Carolina North Dakota Olhio Oklahome Oregon	2 2 2 2 2 3 3 3 3 4 4 4 4 5 5 5 5 6 6 6 6	
North Dakota O Ohio Oklahome O Oregon	3 3 3 3 3 4 4 4 4 5 5 5 5 5 6 6 6 6	
Ohia Okiahoma Oragan	4 4 4 4 5 5 5 5 6 6 6	
Okiahoma O Oragan	5 5 5 5 6 6 6	
O Oregon		
X 7 'V'		
	QQQQQ	•
O Rhode Island	8 8 8 8	
South Carolina	99999	
South Dakota		
X <u>:</u>		
¥		
X		
○ Washington		
○ West Virginia		
Wisconsin		
○ Wyoming		
U.S. TERRITORIES		
O Virgin Islands		
O American Samos		
O Guern		
Other		
	South Dekots Tennessee Texas Utsh Vermont Virginus Washington West Virginus Wisconsin Wyoming U.S. TERRITORIES Puerto Rico Virgin Islands American Samos Guern	South Cardina South Dakots Tennessee Texas Utah Vermont Virginia Washington West Virginia Wisconsin Wyoming U.S. TERRITORIES Puerto Rico Virgin Islands American Samos Guam

23.	How many hours are you unursing position? If you do during a week at your principle.	not work on a routin	ne schedule, hi				
	O Less than 10 O 11 - 20 O 21 - 30 O 31 - 40	41 - 5051 - 6061 or more		·			
24.	For your principal nursing p in the following areas during		<u>د</u>	-	•	ime spent	
			0-24	Percent of 1 25-49	ime Spent 50-74	75-100	
	Administration		O	O	o		
	Consultation with agencies professionals		O	0	0	O	
	Direct patient care, not include supervision.	uding staff	0	o	o	0	
	Research		0	0	0	O	
	Supervision		0	0	O	0	
	Teaching nursing or other s		_	o	o	0	
	Other		0	0	0	0	
25 .	Using the following list, plea were working as of Septemi duty nurse or you work thro of your working time).	per 8, 1992 in your	principal nursi	ng position (if your emplo	syment is that o	f a private
	 Hospital (includes prival or VA hospital) Nursing home/Extended Public health/communit Student health service Employment health service Out patient facility (e.g. clinic, HMO) 	d care facility y health setting	O Nursing	education Government	; regulatory	, or advocacy)	

25.	Using the list below, position.	please mark the one item that be	st corresponds to the	e position title of your primary nursing
	Certified nurse as Charge nurse Clinical nurse spe Consultant Dean, director or director of nur Director or assist of nursing ser General duty nurs Head nurse or ass	cialist associate sing education ant/associate director vice	O Team Leader	assistant supervisor
27.	Does your principal nu week?	rsing position involve direct care	in a hospital setting	during a usual work
	O NO (skip to question O YES	27a.ln what type patient care to	me during a usual w	ork week?
		O Specialty (oth	er than intensive iit m m room partment	O Pediatrics
28.	Do you have a secon	dary job in nursing?		
	○ No○ Yes —— 28a.	If you are employed by more the work you do in your other numbers.	nan one nursing empl sing position(s) for pa	loyer, please indicate the type of ay. (Mark all that apply)
		O Private duty nursing O Work through temporary e O Hospital staff nurse O Teaching O Consultation	mployment service	ResearchCommunity HealthOtherDoes not apply

29. Listed below are different aspects of a nursing career. Please review this list and indicate which aspects are important to you by marking the circle in the column on the left. Then, for those that are important, indicate how satisfied you are with this element in your current position.

PERSONALAJESTYLE Component	impo	ortant	Neutrai	Not Important	1 Verv	2	3	4	S Verv
Stable Employment	•					Satisfied	Neutral	Dissatisfied	
Stable Employment O O O O O O O O O O O O O O O O O O O							•	•	(A)
Employment opportunities for spouse	• •				1				
Availability of child care	• •			_	•				
Time for personal/family life	• • • • • • • • • • • • • • • • • • • •								
Salary	•		_					-	
Adequacy of preceptorship program O O O O O O O O O O O O O O O O O O O					4				
2	•			_	ł .				
Number of hours at work each day	Adequacy of preceptorship program	_O	O_	_ 0		② _	_ ③	④	⑤
Nurse supervisor abilities/support.	2. WORKING CONDITIONS								
Morate in work area.	Number of hours at work each day	_O_	O_	_ 0	ወ _	② _	_ 3 _	@ _:	⑤
Nurse supervisor abilities/support. O O O O O O O O O	Flexibility of schedule	_O_	_ 0_	_ 0	0_	② _	_ 3 _	④	5
Assigned patient-load. Amount of paper work. Cuality of patient care Cinical units. Acknowledgement/appreciation for job performance. Opportunity to work in clinical area or role of choice. Opportunity to make administrative decisions in work setting. Preparation for current position (i.e., orientazion, training) Opportunity for supervisory/managerial experience. Opportunity for supervisory/managerial experience. On the content of the current position of the current position of current pos	Moraje in work area	_O_	_0_	-0-	0_	② _	_ 3 _	④	⑤
Amount of paper work.	Nurse supervisor abilities/support	_O_	_0_	_ 0		② _	_ ③ _		5
Cuality of patient care	Assigned patient-load	_O_	_ 0_	_ 0		② _	3	④	⑤
Frequency of floating to other clinical units	Amount of paper work	_O_	_ 0_	_ 0	0_	② _	_ 3 _	@	⑤
clinical units	Quality of patient care	_O	_ 0_	_ 0		② _	_ 3	@	5
Acknowledgement/appreciation for job performance	Frequency of floating to other								
Acknowledgement/appreciation tor job performance	dinical units	_O_	_ 0_	_ O	0	② _	_ ③ _	④	⑤
tor job performance	3. PROFESSIONAL ISSUES								
Opportunity to work in clinical area or role of choice									
of choice	for job performance	_O_	_ 0_	- 0	0	_ ② _	_	④	5
Opportunity to make administrative decisions in work setting	• • •	-	_			_	_	_	_
in work setting			_ O_	- 0	— O —		_ 3	@	⑤
Preparation for current position (i.e., orientation, training)OOO							(A)	•	
(i.e., orientation, training)OOO				- 🗸	W		_ 🐷	•	⁽³⁾
Opportunity for supervisory/managerial experienceOO	· · · · · · · · · · · · · · · · · · ·	0	0		①	a	3	(A)	(5)
experienceOOOOOOO								&	 •
Variety of nursing experiences available _OOOOOOOOOO		_O	_ 0_	_ 0		②	_ 3	4	(5)
Incentives/support to utilize, conduct, and publish research	Variety of nursing experiences available			1				_	_
and publish research 0						_			. .
		_O	_ O_	_0	①	_ ② _	_ 3	④	5
Nurse-doctor collaboration	Authority to make patient-care decisions	O	O	_ 0	 ①	②	_ ③	④ `	5
	Nurse-doctor collaboration	O	_0_	-0	①	②	_ 3	4	⑤

	li	mportant	Noutral	Not important	1 Very Setisfied	2 Satisfied	3 <u>Neutral</u>	4 Dissatisfied	5 Very <u>Dissettsfied</u>
	4. EDUCATION ISSUES								
	Opportunity to gain continuing education units (CEUs)	0.	0.	o			_ 3 _	@	⑤
	Opportunity to continue education funded by me	0	0.	_0_	L 0_	_ ② _	_ 3 _		⑤
	Opportunity to continue education funded by employer	O.	0.	_0_		② _	_ 3 _	@	⑤
	Opportunity to attend specialty courses		O_	_0_		②	_ 3 _	@	⑤
30.	Overall, how satisfied are you	with nu	rsing?						
	O Very satisfied O Somewhat satisfied O Neither satisfied nor dissatisfied O Somewhat dissatisfied O Very dissatisfied								
31.	Please specify the annual earn deductions for taxes, social se time, private-duty, or self-emple	curity, e	tc. If yo	u do not ha	ve a set ani	nual salan	v. (for ex	ample, you a	re are part-
	 \$5,000 or less \$5,001 to \$10,000 \$10,001 to \$15,000 \$15,001 to \$25,000 \$25,001 to \$30,000 \$30,001 to \$35,000 	O \$4 O \$5 O \$5	0,001 to 5,001 to 0,001 to 5,001 to	\$40,000 \$45,000 \$50,000 \$55,000 \$60,000					
	Please skip to	question	1 34						
32.	How long has it been since you	last wo	rked for	pay as a rec	gistered nur	se?			
	O Less than a year O One year or more								

33.	. Are you actively seeking employment as a registered nurse (e.g., making inquiries as to availabiling of employment, answering advertisements, having interviews)?							
	O No (skip to question 34)							
	O Yes 33a.		er of weeks during which you have ing a nursing position.					
		O Less than two O Two weeks or						
	33b .	Are you looking for position?	r a full-time or part-time nursing					
		O Full-time O Part-time O Either full- or p	part-time					
34.	Are you presently in the military?							
	O No							
	O Yes, Active Duty O Yes, Reserves (Active or Inactive) O Yes, National Guard	34a.	Which branch? O Army O Navy O Air Force O Marine Corps					
35.	Have you ever been in the military?							
	O No							
	O Yes, Active Duty O Yes, Reserves (Active or Inactive) O Yes, National Guard	35a.	Which branch? O Army O Navy O Air Force O Marine Corps					

If you answered YES to either 34 or 35 skip to question 38

36 .	For this section,	please a	answer by	marking	the answer	that best	describes	your opinions	or feelings
-------------	-------------------	----------	-----------	---------	------------	-----------	-----------	---------------	-------------

	1 Definitely Yes	2 Probably Yes	3 No Coinion	4 Probably Not	5 Definitely Not
Before Operation Desert Storm, I would have been interested in serving on active duty as a military nurse	ed		3		(5)
Before Operation Desert Storm, I would have been interested in serving as a nurse in the military reserves.		②	🔊		⑤
Since Operation Desert Storm, I have been interested in senon active duty as a military nurse.	ving ①		3		⑤
Since Operation Desert Storm, I have been interested in servas anuse in the military reserves.	ving ①	②	3	4	⑤

37. Please read the following before answering question 37.

The Active Duty Army Nurse Corps is a full-time job with a 3 to 5 year commitment. After initial military training, you may receive additional specialty training either at your assigned duty station or at a temporary duty station. Reserve and National Guard military service allows people to keep their civilian, full-time jobs and attend school while serving part-time in the military. Reservists and National Guardsmen normally train one weekend a month, in addition to two weeks a year on active duty training. In the event of a national emergency—for example, a natural disaster or military threat—Reservists and Guardsmen can be called up for extended periods of active duty military service.

With this in mind, the following list contains factors other than nursing duties that any nurse considering joining the military would need to consider. Please indicate what effect these factors have on the likelihood that you would enlist in either the Active Duty or Reserve forces.

	1 Very	2 Somewhat	3 Noussi	Somewhat Napathe	§ Very
Active Duty & Reserves	Posme			Necesse	Negative
Salary.	 ①	②	3	@	⑤
Availability of continuing education and specialty training	①	②	3		⑤
Educational loan repayment program	 ①	②	3	@	⑤
Availability of life insurance benefits	①	②	3	④	⑤
Entry bonuses.	 ①		3		⑤
Retirement benefits	 ①	②	3		⑤
Availability of military benefits (PX, commissary)			3	@	⑤
Free travel on military aircraft when available	①	②	3		⑤
Obtaining officer status upon admission	 ①	②	3	④	⑤
Opportunity to serve country		②	3		⑤
Aveilability of child care	 ①	②		@	⑤
Time for personal/iamily life	 ①	②	3		⑤
Scheduling flexibility	①	②	3		⑤
Opportunity for leadership positions	 ①	②	3		⑤
Possibility of being sent to a combat zone	①		3	④	
laving to work/train in the field	①	②	3		⑤
Military lifestyle	①		③	④	⑤
Amount of personal freedom	①				(5)

•	Vi Pos	, -y	Semental Prome	Nousei	Somewhat Name	Very Negative
Amount of paper work	(D	_ ②	_ ③	_ ④ _	⑤
Length of commitment						
Active Duty Only						
Possibility of being relocated.	(D	_ ②	_	_ ④ _	⑤
Number of hours spent at work per day	(D	_ ②	_ ③	_ ④ _	5
Stable employment.	(D	_ ②	_	_ ④ _	5
Reserves or National Guard Only						
Opportunity for second income	(D	_ ②	_	_ @ _	⑤
Yearly two-week active duty training	(D	②	. ③	_ ④ _	⑤
Having to report for weekend duty		D	_ ②	_	_ ④ _	⑤
 39. Have any of the registered nurses you worked No Yes If you answered "NO" to <u>BOTH</u> questions 35 40. Indicate how much you agree or disagree with 	3, & 39, s	skip to Q	uestion 41.			nal Guard?
each statement from the following scale.	1	2	3	4	5	0
	Agree	Agree	Neither Agree	Cinagrae	Disagree	Not enough Knowledge
NURSES WITH ARMY NURSE CORPS EXPERIENCE:	. ①		Nor Dissorte			
Display enthusiasm	. ①	② .	3	④	⑤ _	
Use good judgment in setting work priorities	. D	② .	3	④	⑤ _	
Are able to define a problem and determine the solution	. O _	②	3	④	⑤ _	@
Display self-confidence	. • _	② .	3	④	⑤ _	
Adjust priorities in light of new circumstances	. O _	_ ② .	3	④	⑤ _	@
Recognize potential problems and take corrective action.	. ①	② _	3	④	⑤ _	

		1		2		3	4	5	() Nat energy
		Agree	<u> </u>	Agree	Neid Mar	har Agree Distance	Chagree Somewhat	Company	Krawledge in Respond
	NURSES WITH ARMY NURSE CORPS EXPERIENCE: Display dedication and loyalty	1		2	***************************************	3	_ @ _		
	Stick with a task until it is completed in spite of distractions	0		2		3	_	⑤ _	@
	Participate as team members	0		2	•	3	_ @ _	⑤ _	
	Strive to take on increased responsibility	0		2		3	④	⑤ _	
	Make it a practice to follow up on things to be sure they get done	1	وسيادات	2	•	3	④	5 _	
	Are willing to put in extra time at work	1	***********	2		3	④	5 _	
	Ask pertinent questions which yield the information needed	①	*******	2		3	④	5 _	
	Are punctual in getting to work.	①		2		③	@	⑤ _	
	Are organized and able to handle many things at once	1		2		3	_ ④	⑤ _	
	Recognize when help or advice from others is needed	①		2		3	_ ④ _	⑤ _	
	Provide helpful, friendly service to others who may be impatient or indecisive	①		2	*************	3	④	⑤ _	@
	Show respect for peers, subordinates, and supervisors	1		2		3	@	:	
41.	Overall, how do you think military nursing compa	ares	to nun	sing	in the c	civilian s	ector?		
	 Military nursing is much more rewarding Military nursing is somewhat more rewarding Military nursing is much the same as civilian Military nursing is somewhat less rewarding Military nursing is much less rewarding Not sure 	-	sing						
42.	In your estimate, how do the starting pay and alleretirement contributions) you do/would receive a receive in a starting civilian nursing position?	owa Is a	nces (s militar)	suct y nu	as non Irse con	i-taxable npare to	insuranc what you	e, housing u would/do	ailowance, expect to
	 Military substantially higher Military moderately higher About the same Military moderately lower Military substantially lower Not sure 								

₩.	officer (20 or more years of service) compare to vicareer spanning 20 or more years?	what you could expect in a civilian nursing
	 Army substantially higher Army moderately higher About the same Army moderately lower Army substantially lower Not sure 	
14.	Did either of your parents ever serve in the milit	ary?
	O No O Don't Know/ Not sure O No O Skip to Question 45)	
	O Yes ———————————————————————————————————	Did they serve on: Active Duty Reserves
	44b.	In which service? (mark all that apply) Air Force Army Navy Marine Corps Coast Guard
	44c.	Is(are) your parent(s) either now on duty or retired from the military? O No O Yes, now on duty O Yes, now retired from the military O One retired, one on duty
	44d .	If you ever lived on any military installation(s) while growing up, what did you think of it? Not applicable, never lived on military installation I was too young to remember much about it I liked it a lot I disliked it a lot No strong feelings

45. 1	15. Did a brother(s) and/or sister(s) ever serve in the military?					
Ç	Not applicable, No brothers or sist	ers				
	Yes —		(M O O	which Service? lark all that apply) Army O Ai Navy O Co Marine Corps		
about	hat was your <u>original</u> the Army Nurse Com	os? (Mark only o	nne)			
	O Journal ad O Newspaper ad O School paper ad O Mail O Career day/job fair O Convention exhibit O Symposium/workshop O American Nursing Coffee Review O ANC officer O Instructor/professor Family/friend O Recruiter at recruiting station O School visit by Army nurse recruiter O School visit by other Military recruiter O Prior service O Other					
47. H	O Don't k ave you discussed joi	_	urse Corps?			
00	No (Go to question)	•	(MOOOO	no else did you discu ark all that apply) Mother Father Sibling Spouse or significant other Counselor/teacher	0000	with? Civilian nurse who is an Army reservist Army nurse Other Military recruiter
			with app	ou discussed joining ha military recruiter proach affect you? Very negative Somewhat negative Neutral Somewhat positive Very positive Does not apply	r, hov	Army Nurse Corps w did the recruiter's

(Question	47 continued)		
		wh an . 00	you discussed joining the Army Nurse Corps, at was your impression of the Army program of offerings? Very negative Somewhat negative Neutral Somewhat positive Very positive Does not apply
			nagazines, on billboards, etc., which cover u remember seeing/hearing these ads?
O No			
O Ye	es, and they moderately es, and they slightly inc	creased my interest in journal of the property	in joining ining
49. Do yo which	u remember seeing, re were specifically abou	ading or hearing any act the Army Nurse Corp	ds on TV, on radio, in magazines, on billboards, etc.
Ye into	e (skip to question 50) is, and they greatly incerest in the Army is, and they moderated erest in the Army is, and they slightly incerest in the Army is, and they did not incerest in the Army is, and they did not incerest in the Army	y increased my reased my	In which media did you first see, read, or hear advertising about the Army Nurse Corps? Magazines Television Newspapers Dinner or Unsolicited brochures/ luncheon seminar pamphlets/letters sent from Literature/ local recruiters presentation at Other Army recruiting letter a convention Billboards Radio Radio School paper Career Day Literature requested from recruiter Mark one or more)
O I ra O Ga O Edd O Da	arely watch TV me shows ucational ytime soaps ening drama	O Music/variety O Sports events O Situation comed O Action/adventu O News/special re	O Movies on regular TV O Movies on pay/cable TV by O Public Television O Other

51. What type of radio station do you listen to most often? (Mark one or more)					
	I rarely listen to the radio Rock Soul Jazz	O Classical O News/talk show O Easy listening	O Country/western O Gospel/religious O Other		

Thank you for the time and effort you have taken to complete this survey. If you have any comments or suggestions, please feel free to use the "REMARKS" section below.

If you would like to receive a copy of the final report of this survey, please include your name and mailing address. You may mail the part of the form with your name and address in separately if you wish. This will assure that your anonymity with respect to the specific survey responses is absolute.

REMARKS:

APPENDIN F

THE U.S. ARMY SURVEY OF NURSING STUDENTS

HumRRO Inter	national, Inc.
66 Canal Center	Plaza, Suite 400
Alexandria, VA	22314

APPROVED OMB NUMBER_	
EXPIRES:	

The U.S. Army Survey of Nursing Students

HumRRO International, Inc. 66 Canal Center Plaza, Suite 400 Alexandria, VA 22314.

AUTHORITY: Public Law 93-573, called the Privacy Act of 1974, requires that you be informed of the purpose and uses to be made of the information that is collected. The Federal Government may collect the information requested in the 1992 Survey of Nursing Students under the authority of 10 United States Code 137, 503, 2358.

PRINCIPAL PURPOSE: This survey is being conducted to help the Federal Government learn more about the beliefs of nursing students regarding various aspects of their profession, as well as their knowledge and views of the Army Nurse Corps (ANC). Your responses will aid the ANC as it evaluates various programs and policies. In addition, the results of this survey will provide insight into a number of work-related and professional issues confronting nurses today.

DISCLOSURE: Providing information in this questionnaire is voluntary. You do not have to answer particular questions if you choose not to. The information you give us is protected under the Privacy Act of 1974. Your answers will be kept confidential and your identity will never be known to anyone. This is not a test. There are no right or wrong answer, so please be as honest as you can about your feelings.

ROUTINE USES: Information on individual respondents will not be released to other agencies or institutions. Only group statistics will be reported in the findings from this project. Copies of the final report will be provided to the Office of the Army Surgeon General, the Army Nurses Corps, and Army personnel and research agencies. The contractor and the Army will produce in-house publications on overall results. In some cases manuscripts of findings will be presented at conferences, symposia, scientific meetings, and in professional journals.

APPROVED	OMB NUMBE	R	
EXPI	RES:		

Public reporting burden for this collection of information is estimated to average 30 minutes per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, to Department of Defense, Washington Headquarters Services, Directorate for Information Operations and Reports, 1215 Jefferson Davis Highway, Suite 1204, Arlington, VA 22202-4302, and to the Office of Management and Budget, Paperwork Reduction Project, Washington, DC 20503. Please DO NOT RETURN your (form/questionnaire) to either of these addresses. Send your completed (form/questionnaire) to:

HumRRO International, Inc. 66 Canal Center Plaza, Suite 400 Alexandria, VA 22314.

INSTRUCTIONS FOR MARKING

- . Use only a soft lead pencil (a standard No. 2 is ideal.)
- . Make heavy marks that fill the circle.
- . Erase cleanly any answer you wish to change.
- . Make no stray markings of any kind. Please write any comments on a separate sheet of paper.
- . Fill in only one circle for each question unless you are told to "mark all that apply"
- . Where numbers are called for in an answer, first write your answer in the boxes provided and then fill in the circles underneath which represent the numbers you have placed in the boxes.

EXAMPLE A:

How old were you on November 4, 1992?

21

Years

EXAMPLE B:

Will marks made with ballpoint pen or felt-tip pen be properly read?

o Yes

e No

Ba	ckground				
1.	Are you ?	6.	What race do you co	onsider yourself? (Mark only one)	
	○ Female○ Male		O Black	Eskimo or AleutAsian or Pacific IslanderOther	
2	What is your month and year of birth?		(American)	•	
	Month OO Year 19OO 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0	7.	Are you of Spanish O No O Yes (Mexican, Mexican-Americ Chicano) O Yes (Puerto Ric	O Yes (Cuban) O Yes (Other Spanish, can, Hispanic)	
3.	Are you a US citizen (native born or naturalized)?				
	O No (Skip to end of survey) O Yes				
4.	What is your current marital status?				
	O Married O Divorced or separated O Widowed Never married				
5	Do you have a child or children living at home with you on a full- or part-time basis?			basis?	
	O NO		•		
	O YES 5a. Are these children				
All less than 6 years old?All 6 years old or older?Both younger and older than 6 years?					
Ec	tucation			·	
8.	What school year are you?				
	O Freshman O Sophomore O Junior O Senior O Post Baccalaureate O Degree in another acade O RN pursuing a BSN deg		discipline, pursuing a	a BSN degree	

9	Are you considered a full-time	or part-time student?		
	Full-time studentPart-time student			
10.	What degree are you currently	working toward in this progr	am? (Mark only one answer)	
	Associate degreeBaccalaureateMaster's	O Doctorate O Other		
11.	What was the approximate tuit	ion charge by your school la	st semester?	
	○ less than \$500○ \$501 to \$1,500○ \$1,501 to \$2,500	\$2,501 to \$5,000\$5,001 to \$7,500\$7,501 to \$10,000	\$10,001 to \$15,000\$15,001 to \$20,000more than \$20,000	
12	By the time you finish this degr (including tuition, books, fees, re			-
	○ less than \$5,000 ○ \$5,001 to \$10,000 ○ \$10,001 to \$15,000 ○ \$15,001 to \$20,000 ○ \$20,001 to \$25,000 ○ \$25,001 to \$30,000	○ \$35,001 to \$40,000 ○ \$40,001 to \$45,000 ○ \$45,001 to \$50,000 ○ \$50,001 to \$55,000		
13.	How are your tuition and fees t	peing financed? (Mark all tha	t apply)	
	 Personal savings Your own personal earnings Spouse's earnings from emp Parental contributions Employer tuition reimbursem (including Veterans Administration plan) Non-military Federal trainees or grant 	ent plan stration employer	 Non-military Federally-assisted to State or local government loan or Non-government scholarship, load University teaching or research for Other sources Military loan/scholarship program If military, which service - O A A 	r scholarship n or grant ellowship n rmy
14.	In terms of the degree which yo have you received to date?	u are currently pursuing; how	much financial aid (e.g., loans, schol	arships, grants)
	 ○ None ○ less than \$5,000 ○ \$5,001 to \$7,500 ○ \$7,501 to \$10,000 ○ \$10,001 to \$12,500 	○ \$12,501 to \$15,000 ○ \$15,001 to \$17,500 ○ \$17,501 to \$20,000 ○ more than \$20,000		

13.	HOW MUCH IN	ioney diawiii	you suit owe arrer g	raduation?	
	○ None ○ less than : ○ \$5,001 to ○ \$7,501 to ○ \$10,001 to	\$7,500 \$10,000	\$12,501 to\$15,001 to\$17,501 tomore than	\$17,500 \$20,000	
16.	What was yo	ur primary sta	atus at the time you	applied to the school of nursing?	
	O Student/re O Looking for O Employed		ed nurse		
			her than nursing ther than nursing	other than nursing before entering a nuprogram, in what way did you think nuwould be better than the job you had?	ursing
				O Not applicable, I wasn't employed f	ull-time
				O Better salary O More au O Better work schedule O More rev O Better benefits O More me O More autonomy O More inv O More interesting	warding vaningfu
17.	a nurse. In co	olumn 2 fill in 1 r third most in	the circle correspond reportant reason. (77	onds to your most important reason for wanting to be ling to your 2nd most important reason, and in here should be one mark in each column.)	come
	1 Most : Important Resson	2 2nd Most Important Reason	3 3rd Most Important Reason		
	0	o	0	To care for/help people	
,	0	o	0	Professional respect	
	0	0	0	Job security	
	0	0	0	Interesting job	
	0	0	0	Wanted active hands-on profession	
	0	0	0	To gain technical experience	
	0	0	0	To gain leadership experience	
	0	0	0	Sense of independence	
	0	0	O	Degree of decision making authority	
	0		0	Broad range of practice opportunities	
	0	0	0	Salary level	
				Other	

8. How much influence did each of the following	ng have on your de Positive Influence	ecision to pu No Influence	rsue a nursi Negative Influence	ng career? Does Not Apply
High school teacher		o_	0	0
High school counselor	0	0	0_	0
Nursing professor	0	O	0	0
Friend(s)	0	0	0	0
Nurse recruiter (military)	O	0	0_	0
Nurse recruiter (hospital)	O	O	0_	
Nurse counselor		O	O	0
Parent(s)	O	O	0	0
Child(ren)		0	O	0
Spouse or significant other		O	O	0
Brother(s)/sister(s)	_	O	0	0
College professor (non-nursing)		0	0	O
Media advertisement		O	0	
Family tradition	O	0	0	0
Other		0		0

19. Using the list below, please indicate the one item which best corresponds to the position which you desire. (Mark only one for each of the three time periods)

	Upon Graduation	Five Years After Graduation	Ten Years After Graduation
Patient Care Certified nurse anesthetist	0	0	0
Charge nurse			0
Clinical nurse specialist.			
General duty nurse			0
Nurse clinician			0
Nurse coordinator			
Nurse midwife			0
			0
Nurse practitioner			
Private duty nurse			
Public health nurse			
School nurse			0
Staff nurse.	O	0	O
Management/Administration Administrator or assistant administrator	0	0	0
Director or assistant/associate director of nursing service		0	0
Head nurse or assistant head nurse		0	0
Patient care coordinator.		0	0
Supervisor or assistant supervisor			
Team leader			
Education Dean, director, or assistant/associate director of nursing education			0
In service education director or instructor	O		0
Instructor			O
Professor or assistant/associate professor	О	O	0
Other Consultant			
Researcher			0
Other			0

20. When seeking employment upon graduation: (1) rate the importance of the following factors, and (2) rate the sector where each may be BEST achieved.

Court Wildie Cash May 60 Ca			A0 - A	Best Achieved in			
	Important	Neutral	Not Important	Equally Civilian Military in Both	Don't Know		
1. PERSONAL/LIFESTYLE							
Opportunity to serve others	O	0	0	00 0	O		
Stable Employment	0	0_	0	<u>o_o_</u> o	O		
Employment opportunities for spouse	_0	0	0	<u> </u>	O		
Availability of child care	O	0	0	<u>o_o_o_</u>	O		
Time for personal/tamily life	O	0	0	00	O		
Salary	O	0	0		O		
Adequacy of preceptorship program	0	O	0	Lo_o_o_	O		
2. WORKING CONDITIONS							
Length of working hours	0	0	0		O		
Flexibility of schedule	O	0	0				
Morale in work area	0	0	0		O		
Nurse supervisor abilities/support	O	0	0		O		
Assigned patient-load	O	0	0	oo o	O		
Amount of paper work	O	0	O	Lo_o_ o	O		
Quality of patient care	O	0	O	Loo o	O		
Frequency of floating to other							
dinical units	O	0	0	000	O		
3. PROFESSIONAL ISSUES							
Acknowledgement/appreciation	_	_	_		_		
for job performance	O	O	O	JOOO	O		
Opportunity to work in clinical area or	role						
of choice		O	O	OOO	O		
Opportunity to make administrative do in work setting	_	0	0	Lo_o_o_	0		
Preparation for current position	······································						
(i.e., orientation, training)	0	0	0		O		
Opportunity for supervisory/manager	rial						
experience	0	_ 0_	O		O		
Variety of nursing experiences availab	te_O	O	0		0		
incentives/support to utilize, conduct,	_	_	_		_		
and publish research	_		O		O		
Authority to make patient-care decision		_	0	<u> </u>	O		
Nurse-doctor collaboration	O	O	O	LO_O_O_	O		

				Nat		Best Achieved in				
		Important	Neutral		Civilian	Military	in Both	Dan't Know		
	4. EDUCATION ISSUES									
	Opportunity to gain continuing education units (CEUs)	0	_ 0_	0		_0_	O	0		
	Opportunity to continue education funded by me	0	_ 0_	0		_0_	_ O	_0		
	Opportunity to continue education funded by employer	O	_ 0_	0		_0_	O	0		
	Opportunity to attend specialty course as ICU course, practitioner courses	es, such O	0_	0		_0_	O	0		
21.	For this section, mark the answ	er that best	describes	your opinion	ns or feeling	s.				
			De	1 Hinitely Yes	2 Probably Yes		4 Probably: Not			
	Before Operation Desert Storm, I wou in serving on active duty as a military nurse			• • • • • • • • • • • • • • • • • • • •		3	●	⑤		
	Before Operation Desert Storm, I wou in serving as a nurse in the military res			.	_ ②	3		⑤		
	Since Operation Desert Storm, I have on active duty as a military nurse.				_ ②	3		5		
	Since Operation Desert Storm, I have		•	①		a	a	(5)		

22 Please read the following before answering question 22.

The Active Duty Army Nurse Corps is a full-time job.with a 3 to 5 year commitment. After initial military training, you may receive additional specialty training either at your assigned duty station or at a temporary duty station. Reserve and National Guard military service allows people to keep their civilian, full-time jobs and attend school while serving part-time in the military. Reservists and National Guardsmen normally train one weekend a month, in addition to two weeks a year on active duty training. In the event of a national emergency—for example, a natural disaster or military threat—Reservists and Guardsmen can be called up for extended periods of active duty military service.

threat-Reservists and Guardsmen can be called up for extended periods of active duty military service.

With this in mind, the following list contains factors other than nursing duties that any nurse considering joining the military would need to consider. Please indicate what effect these factors have on the likelihood that you would enlist in either the Active Duty or Reserve forces.

	1 Very Position	2 Semewhea Positive	3 Novinsi	Somewhat Nacemen	S Very Necestre
Active Duty & Reserves					
Salary.	0	②	3	④	⑤
Availability of continuing education and specialty training	 ①	②	3	④	⑤
Educational loan repayment program.	0		3	④	⑤
Availability of life insurance benefits	 ①	②	③	@	⑤
Entry bonuses	 ①	②	3	@	⑤
Retirement benefits	 0	②	3	④	⑤
Availability of military benefits (PX, commissary)	0	②	3	@	⑤
Free travel on military aircraft when available	0	②	3	④	⑤
Obtaining officer status upon admission.	0	②	3	④	⑤
Opportunity to serve country	0	②	3		⑤
Availability of child care	0	②	3	4	5
Time for personal/family life	O	②	3	4	⑤
Scheduling flexibility	0	②	3	④	⑤
Opportunity for leadership positions	0	②	3	④	⑤
Possibility of being sent to a combat zone	0	②	③	4	5
Having to work/train in the field	0	②	3	4	⑤
Military lifestyle	0	②	3	@	⑤
Amount of personal freedom	0	②	3	@	⑤
Amount of paper work	①	②	3	@	⑤
Length of commitment.	 ①`		3	④	⑤
Active Duty Only					
Possibility of being relocated.	0	②	3	④	⑤
Number of hours spent at work per day	0	②	3	@	⑤
Stable employment.	0	②	3	④	⑤
Reserves & National Guard Only					
Opportunity for second income	0	②	③	④	⑤
Yearly two-week active duty training	 ①	②	3	④	⑤
Having to report for weekend duty	 ①	②	3	④	⑤

Z3 .	Do you know any individuals who are serving or have served on Active Duty in the Army Nurse Corps:
	O No O Yes
24.	Overall, how do you think military nursing compares to nursing in the civilian sector?
	 Military nursing is much more rewarding Military nursing is somewhat more rewarding Military nursing is much the same as civilian nursing Military nursing is somewhat less rewarding Military nursing is much less rewarding Not sure
25.	In your estimate, how does the starting pay and allowances (such as non-taxable housing allowance, insurance and retirement contributions) you do/would receive as a military nurse compare to what you would/do expect receive in a starting civilian nursing position?
	 Military substantially higher Military moderately higher About the same Military moderately lower Military substantially lower Not sure
26.	In your estimate, how does the total pay and allowances you would receive as a career Army officer (20 or more years of service) compare to what you could expect in a civilian nursing career of 20 or more years?
	 Army substantially higher Army moderately higher About the same Army moderately lower Army substantially lower Not sure

2 .	Did entries of your parents ever serve in the minute y:							
	O No (Skip to Question 28) O Don't Know/ Not sure							
	O Yes ————	· 27a.	Did they serve on: Active Duty Reserves					
		276.	In which service? (Mark all that apply) Air Force Army Navy Marine Corps Coast Guard					
		<i>27</i> c.	Is(are) your parent(s) either now on duty or retired from the military? No Yes, now on duty Yes, now retired from the military One retired, one on active duty					
		27d.	If you ever lived on any military installation(s) while growing up, what did you think of it? Not applicable, never lived on military installation I was too young to remember much about it I liked it a lot No strong feelings					
28.	Did your brother(s) and/or sister(s) ever se	erve in t	the military?					
	Not applicable,No brothers or sistersNo							
	O Yes	(M (O (O	which Service? lark all that apply) Army					

	out the Army Nurse Corps? <i>(Mark</i>				
C300000	Journal ad Newspaper ad School paper ad Mail Career day/job fair Convention exhibit Symposium/workshop American Nursing Coffee	000 0 0	Instructor/professor Family/friend Recruiter at recruiting station School visit by Army nurse recruiter School visit by other Military recruiter Prior service O Other		
30. Ha	ve you discussed joining the Army	-	rse Corps?		
	No (Go to question 31) Yes		 30a. Who else did you discus (Mark all that apply) Mother Father Sibting Spouse or significant other Counselor/teacher 30b. If you discussed joining with a military recruiter, approach affect you? Very negative Somewhat negative Neutral Somewhat positive Very positive Does not apply 	O OOO the how	Civilian nurse who is an Army reservist Army nurse Other Military recruiter
			30c.If you discuss. I joining what was your impressi and offerings? Very negative Somewhat negative Neutral Somewhat positive Very positive Does not apply	on c	

31			gazines, on bilipoards, etc., which cover emember seeing/hearing these ads?			
	O No		•			
	 Yes, and they greatly incre Yes, and they moderately Yes, and they slightly incre Yes, and they did not incre 	increased my interest in eased my interest in join	joining ing			
32	. Do you remember seeing, rea which were specifically about	ding or hearing any ads the Army Nurse Corps?	on TV, on radio, in magazines, on biliboards, etc.			
	O No (skip to question 33)					
	 Yes, and they greatly increased my interest in the Army Yes, and they moderately increased my interest in the Army Yes, and they slightly increased my interest in the Army Yes, and they did not increase my interest in the Army 		In which media did you first see, read, or hear advertising about the Army Nurse Corps? Magazines Television Newspapers Dinner or Unsolicited brochures/ luncheon seminar pamphlets/letters sent from Literature/ local recruiters presentation at Other Army recruiting letter a convention Billboards Dursing journals Radio journals School paper Recruiter school visit - Army Literature requested from - Other services			
33.	What type of TV programs do	o you most prefer to wa	tch?(Mark one or more)			
	O I rarely watch TV O Game shows O Educational O Daytime soaps O Evening drama	Music/varietySports eventsSituation comedyAction/adventureNews/special report	O Other			
34.	What type of radio station do	you listen to most often	?(Mark one or more)			
	I rarely listen to the radioRockSoulJazz	O Classical O News/talk show O Easy listening	O Country/western O Gospel/religious O Other			

Thank you for the time and effort you have taken to complete this survey. If you have any comments or suggestions, please feel free to use the "REMARKS" section below.

If you would like to receive a copy of the final report of this survey, please include your name and mailing address. You may mail the part of the form with your name and address in separately if you wish. This will assure that your anonymity with respect to the specific survey responses is absolute.

REMARKS: